**YAMAHA**

116pgs

# OWNER'S MANUAL

# XVZ13A
# XVZ13AT

LIT-11626-12-33

Dear Yamaha ATV Owner: Please Review this IMPORTANT SAFETY CARD before operating your ATV (If card is not attached, call 1-800-344-6418).

# READ CAREFULLY

Dear New Yamaha ATV Owner:

CONGRATULATIONS ON THE PURCHASE OF YOUR NEW YAMAHA ATV. You have purchased a quality Yamaha product that, with proper use and care, will provide hours of riding pleasure. **BEFORE YOU OPERATE YOUR NEW ATV, Yamaha recommends these important points:**

- READ YOUR OWNER'S MANUAL
- A CHILD UNDER 12 YEARS OLD SHOULD NOT OPERATE AN ATV WITH ENGINE SIZE 70CC OR GREATER
- A CHILD UNDER 16 YEARS OLD SHOULD NOT OPERATE AN ATV WITH ENGINE SIZE GREATER THAN 90CC
- TAKE THE FREE HANDS-ON TRAINING COURSE OFFERED BY YAMAHA — ASK YOUR DEALER FOR DETAILS OR CALL 1-800-887-2887

If you have any questions about these points, **or if you purchased your ATV from an authorized Yamaha dealership and were not informed of the age recommendation for your ATV by the dealership,** please fill out the information below and mail this card to Yamaha **today.**

Name: ______________________

ATV Model: ______________________

Purchase Date: ___ ___ ___
MO. DAY YR.

Address: ______________________
______________________

Primary I.D. (Engine Number): ____ — ______

Telephone:
(     ) ______________________

Dealer Name & Address: ______________________
______________________

This is not a warranty card

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YAMAHA MOTOR CORPORATION U.S.A.
P.O. BOX 6555
CYPRESS, CALIFORNIA **90630-9989**

ATTN: SALES ADMINISTRATION

# INTRODUCTION

Congratulations on your purchase of the Yamaha Royal Star™/Royal Star™ Tour Classic™. This model is the result of Yamaha's vast experience in the production of fine sporting, touring, and pacesetting racing machines. It represents the high degree of craftsmanship and reliability that have made Yamaha a leader in these fields.

This manual will give you an understanding of the operation, inspection, and basic maintenance of this motorcycle. If you have any questions about the operation or maintenance of your motorcycle, please consult a Yamaha dealer.

The design and manufacture of this Yamaha motorcycle fully comply with the emissions standards for clean air applicable at the date of manufacture. Yamaha has met these standards without reducing the motorcycle's performance or economy of operation. To maintain these high standards, it is important that you and your dealer pay close attention to the recommended maintenance schedules and operating instructions contained within this manual.

# IMPORTANT MANUAL INFORMATION

Particularly important information is distinguished in this manual by the following notations:

| | |
|---|---|
| ⚠ | The Safety Alert Symbol means ATTENTION! BECOME ALERT! YOUR SAFETY IS INVOLVED! |
| ⚠ WARNING | Failure to follow WARNING instructions could result in severe injury or death to the motorcycle operator, a bystander or a person inspecting or repairing the motorcycle. |
| **CAUTION:** | A CAUTION indicates special precautions that must be taken to avoid damage to the motorcycle. |
| **NOTE:** | A NOTE provides key information to make procedures easier or clearer. |

**NOTE:**

- This manual should be considered a permanent part of this motorcycle and should remain with it even if the motorcycle is subsequently sold.
- Yamaha continually seeks advancements in product design and quality. Therefore, while this manual contains the most current product information available at the time of printing, there may be minor discrepancies between your motorcycle and this manual. If there is any question concerning this manual, please consult your Yamaha dealer.

# IMPORTANT MANUAL INFORMATION

**⚠ WARNING**

**PLEASE READ THIS MANUAL AND THE “YOU AND YOUR MOTORCYCLE: RIDING TIPS” BOOKLET CAREFULLY AND COMPLETELY BEFORE OPERATING THIS MOTORCYCLE. DO NOT ATTEMPT TO OPERATE THIS MOTORCYCLE UNTIL YOU HAVE ATTAINED A SATISFACTORY KNOWLEDGE OF ITS CONTROLS AND OPERATING FEATURES AND UNTIL YOU HAVE BEEN TRAINED IN SAFE AND PROPER RIDING TECHNIQUES. REGULAR INSPECTIONS AND CAREFUL MAINTENANCE, ALONG WITH GOOD RIDING SKILLS, WILL ENSURE THAT YOU SAFELY ENJOY THE CAPABILITIES AND THE RELIABILITY OF THIS MOTORCYCLE.**

AFFIX DEALER

LABEL HERE

XVZ13AL(C)/XVZ13ATL(C)
OWNER'S MANUAL
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# ⚠ SAFETY INFORMATION

TWO-WHEELED MOTORCYCLES ARE SINGLE TRACK VEHICLES. THEIR SAFE USE AND OPERATION ARE DEPENDENT UPON THE USE OF PROPER RIDING TECHNIQUES AS WELL AS THE EXPERTISE OF THE OPERATOR. EVERY OPERATOR SHOULD KNOW THE FOLLOWING REQUIREMENTS BEFORE RIDING.

HE OR SHE SHOULD:

1. OBTAIN THOROUGH INSTRUCTIONS FROM A COMPETENT SOURCE ON ALL ASPECTS OF MOTORCYCLE OPERATION.
2. OBSERVE THE WARNINGS AND MAINTENANCE REQUIREMENTS IN THE OWNER'S MANUAL.
3. OBTAIN QUALIFIED TRAINING IN SAFE AND PROPER RIDING TECHNIQUES.
4. OBTAIN PROFESSIONAL TECHNICAL SERVICE AS INDICATED BY THE OWNER'S MANUAL AND/OR WHEN MADE NECESSARY BY MECHANICAL CONDITIONS.

## Safe riding

1. Always make pre-operation checks. Careful checks may help prevent an accident.
2. This motorcycle is designed to carry the operator and a passenger.
3. The failure of motorists to detect and recognize motorcycles in traffic is the predominating cause of automobile/motorcycle accidents. Many accidents have been caused by an automobile driver who did not see the motorcycle. Making yourself conspicuous appears to be very effective in reducing the chance of this type of accident.

   Therefore:

   a. Wear a brightly colored jacket.
   b. Use extra caution when you approach and pass through intersections, since intersections are the most likely places for motorcycle accidents.
   c. Ride where other motorists can see you. Avoid riding in another motorist's "blind spot".

4. Many accidents involve inexperienced operators. In fact, many operators who have been involved in accidents do not even have a current motorcycle license.
   a. Make sure you are qualified. Also, only lend your motorcycle to experienced operators.
   b. Know your skills and limits. Staying within your limits may help you to avoid an accident.
   c. We recommend that you practice riding your motorcycle where there is no traffic until you have become thoroughly familiar with your motorcycle and all of its controls.
5. Many motorcycle accidents have been caused by motorcycle operator errors. A typical error made by the operator is veering wide on a turn due to EXCESSIVE SPEED or undercornering (insufficient lean angle for the speed).
   a. Always obey the speed limits and never travel faster than warranted by road and traffic conditions.
   b. Always signal before turning or changing lanes. Make sure other motorists see you.
6. The operator's and passenger's posture are important for proper control.
   a. The operator should keep both hands on the handlebars and both feet on the operator footrests during operation to maintain control of the motorcycle.
   b. The passenger should always hold on to the operator, or the seat strap or grab bar if the motorcycle is so equipped, with both hands and keep both feet on the passenger footrests.
   c. Never carry a passenger unless he or she can firmly place both feet on the passenger footrests.
7. Never ride under the influence of alcohol or drugs.
8. This motorcycle is designed for on-road use only. It is not suitable for off-road use.

## Protective apparel

The majority of fatalities from motorcycle accidents are the result of head injuries. The use of a safety helmet is the single most critical factor in the prevention or reduction of head injuries.

1. Always wear an approved helmet.
2. Wear a face shield or goggles. Wind on your unprotected eyes could contribute to an impairment of vision which could delay seeing a hazard.
3. The use of heavy boots, jacket, trousers, gloves, etc. is effective in preventing or reducing abrasions or lacerations.
4. Never wear loose fitting clothing. It could catch on the control levers, footrests, or wheels and cause injury or accident.
5. Never touch the engine or exhaust system during or after operation. They become very hot and can cause burns. Always wear protective clothing that covers your legs, ankles, and feet.
6. A passenger should also observe the above precautions.

## Modification

Modifications made to the motorcycle not approved by Yamaha, or the removal of original equipment, may render your motorcycle unsafe for use and may cause severe personal injury. Modifications may also make your motorcycle illegal to use.

## Loading and accessories

Adding accessories or cargo to your motorcycle can adversely affect stability and handling if the weight distribution of the machine is changed. To avoid the possibility of an accident, extreme caution should be used if adding cargo or accessories to your motorcycle. Use extra care if riding a motorcycle which has added cargo or accessories. Here are some general guidelines to follow if loading cargo or adding accessories to your motorcycle:

## Loading

The total weight of the operator, passenger, accessories and cargo must not exceed the maximum load limit of XVZ13A(C): 448 lbs. (203 kg)/XVZ13AT(C): 410lbs (186 kg).
When loading within these weight limits, keep the following in mind:

1. Cargo and accessory weight should be kept as low and close to the motorcycle as possible. Be sure to distribute the weight as evenly as possible on both sides of the machine to minimize imbalance or instability.
2. Shifting weights can create a sudden imbalance. Make sure that accessories and cargo are securely attached to the motorcycle before riding. Recheck accessory mounts and cargo restraints frequently.
3. Never attach any large or heavy items to the handlebars, front forks, or front fender. These items, including such cargo as sleeping bags, duffle bags, or tents, can create unstable handling or slow steering response.

## Accessories

Genuine Yamaha accessories have been specifically designed for use on this motorcycle. Since Yamaha cannot test all other accessories which may be available, you must personally be responsible for the proper selection, installation and use of non-Yamaha accessories. You should use extreme caution when selecting and installing any accessories.

Keep in mind these guidelines for mounting accessories in addition to those provided under “LOADING”.

1. Never install accessories or carry cargo that would impair the performance of your motorcycle. Carefully inspect the accessory before using it to make sure it does not in any way reduce ground clearance or cornering clearance, limit suspension travel, steering travel or control operation, or obscure lights or reflectors.

   a. Accessories fitted to the handlebar or the front fork area can create instability due to improper weight distribution or aerodynamic changes. If accessories are added to the handlebar or front fork area, they must be as lightweight as possible and should be kept to a minimum.
   b. Bulky or large accessories may seriously affect the stability of the motorcycle due to aerodynamic effects. Wind may attempt to lift the motorcycle, or the motorcycle may become unstable in cross winds. These accessories may also cause instability when being passed by or passing large vehicle.
   c. Certain accessories can displace the operator from his or her normal riding position. This improper position limits the freedom of movement of the operator and may limit control ability. Therefore such accessories are not recommended.
2. Caution must be used if adding electrical accessories. If these accessories exceed the capacity of the motorcycle's electrical system, an electric failure could result, which could cause a dangerous loss of lights or engine power.

## Gasoline and exhaust gas

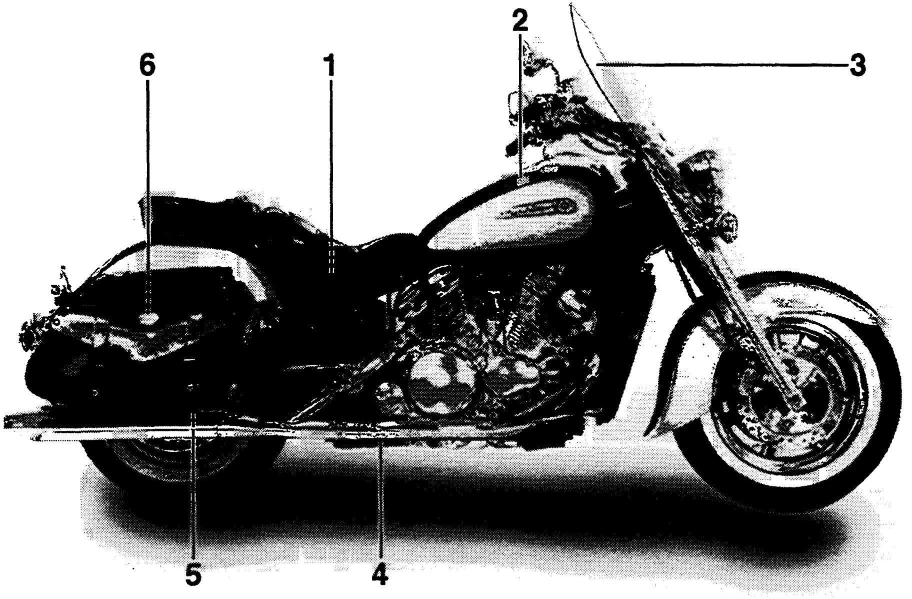
1. GASOLINE IS HIGHLY FLAMMABLE:
   a. Always turn off the engine when refueling.
   b. Take care not to spill any gasoline on the engine or exhaust system when refueling.
   c. Never refuel while smoking or in the vicinity of an open flame.
2. Never start the engine or let it run for any length of time in a closed area. The exhaust fumes are poisonous and may cause loss of consciousness and death within a short time. Always operate your motorcycle in an area that has adequate ventilation.
3. Always turn off the engine before leaving the motorcycle unattended and remove the ignition key. When parking the motorcycle, note the following:

   a. The engine and exhaust system may be hot. Park the motorcycle in a place where pedestrians or children are not likely to touch these hot areas.
   b. Do not park the motorcycle on a slope or soft ground; the motorcycle may fall over.
   c. Do not park the motorcycle near a flammable source, e.g. a kerosene heater, or near an open flame. The motorcycle could catch fire.

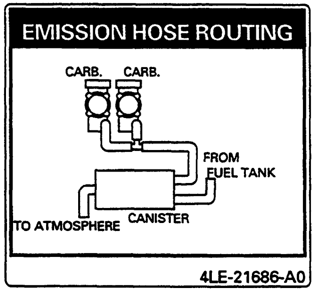
4. When transporting the motorcycle in another vehicle, be sure it is kept upright and that the fuel cock is turned to "ON" or "RES" (for vacuum type)/"OFF" (for manual type). If it should lean over, gasoline may leak out of the carburetor or fuel tank.
5. If you should swallow any gasoline, inhale a lot of gasoline vapor, or allow gasoline to get in your eyes, see your doctor immediately. If any gasoline spills on your skin or clothing, immediately wash it off with soap and water and change your clothes.

## Location of the important labels

Please read the following labels carefully before operating this motorcycle.



## 1 California only



## 2

**⚠WARNING**

- BEFORE YOU OPERATE THIS VEHICLE, READ THE OWNER'S MANUAL AND ALL LABELS.
- ALWAYS WEAR AN APPROVED MOTORCYCLE HELMET, eye protection, and protective clothing.

3MX-2118K-A0

## 3 XVZ13AT(C)

**CAUTION**

Cleaning with alkaline or acid cleaner, gasoline or solvent will damage windshield. Use neutral detergent.

**YAMAHA** 4NL-F835Y-00

## 4

**⚠WARNING**

This unit contains high pressure nitrogen gas. Mishandling can cause explosion.

- Read owner's manual for instructions.
- Do not incinarate, puncture or open.

**YAMAHA** 4AA-22259-00

## 5

**TIRE INFORMATION**

Cold tire normal pressure should be set as follows.

- Up to 90 kg (198 lbs) load

**FRONT** : 250 kPa, (2.50 kgf/cm$^2$), 36 psi
**REAR** : 250 kPa, (2.50 kgf/cm$^2$), 36 psi

- 90 kg (198 lbs) ~ maximum load

**FRONT** : 250 kPa, (2.50 kgf/cm$^2$), 36 psi
**REAR** : 280 kPa, (2.80 kgf/cm$^2$), 41 psi

4NK-21668-A0

## 6 XVZ13AT(C)

**⚠WARNING**

**Improper loading can adversely affect handing.**

- Do not exceed maximum load limit: 11 lb (5 kg) each saddlebag.
- Distribute weight evenly from side to side.
- Read the Owner's Manual for important loading and tire pressure information.
- Total weight of rider, passenger, accessories, and cargo must not exceed the motorcycle load capacity shown in the Owner's Manual.
- Never ride above 80mph (120 km/h) with saddlebags because handing could be affected. This maximum speed may be reduced by such factors as improper loading, poor tire or overall motorcycle conditions, poor road surfaces, or adverse weather conditions.

**YAMAHA** 4NL-F8466-00

# DESCRIPTION

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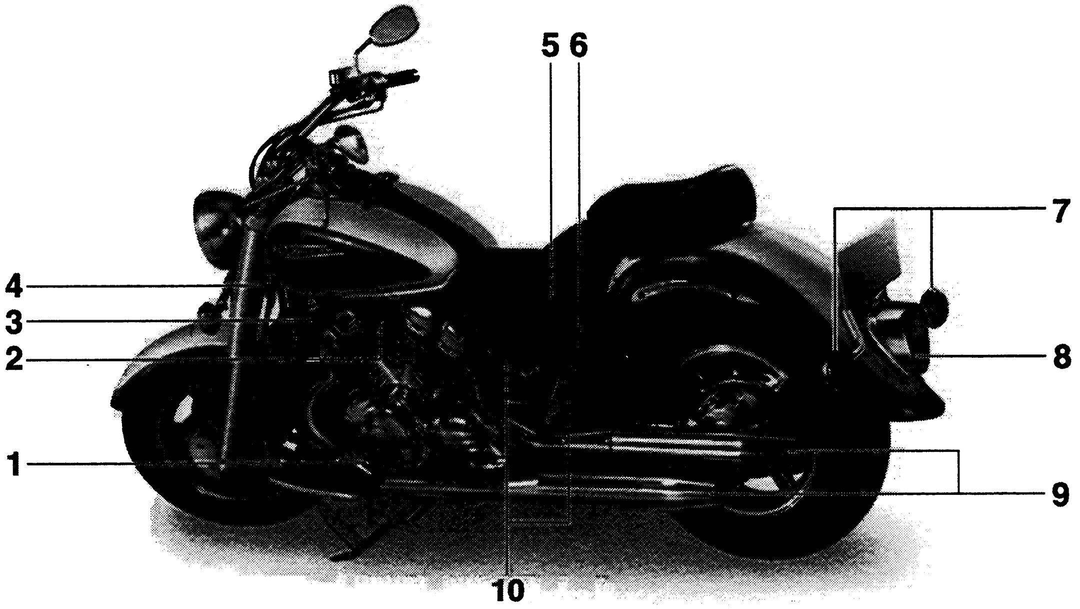
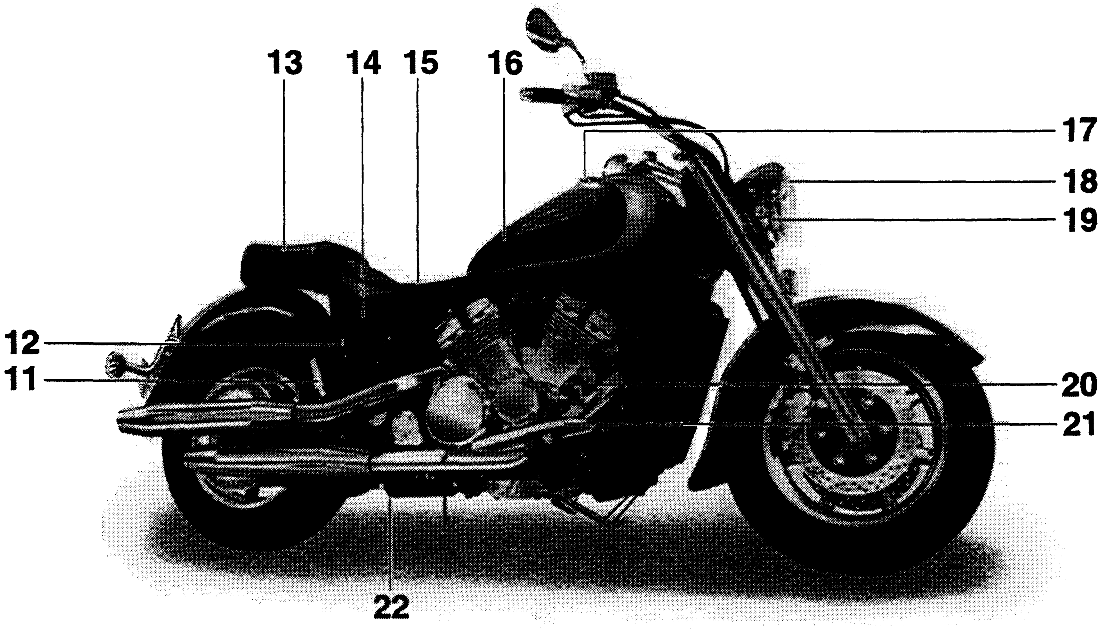
# DESCRIPTION

## Royal Star™
## XVZ13A(C) Left view



| | | | |
|---|---|---|---|
| 1. Shift pedal | (page 3-5) | 6. Seat lock | (page 3-11) |
| 2. Starter (choke) “\|↘\|” | (page 3-10) | 7. Rear turn signal lights | (page 6-30) |
| 3. Fuel cock | (page 3-9) | 8. Tail/brake light | (page 6-30) |
| 4. Steering lock | (page 3-10) | 9. Muffler | |
| 5. Tool kit | (page 6-1) | 10. Fuses | (page 6-27) |

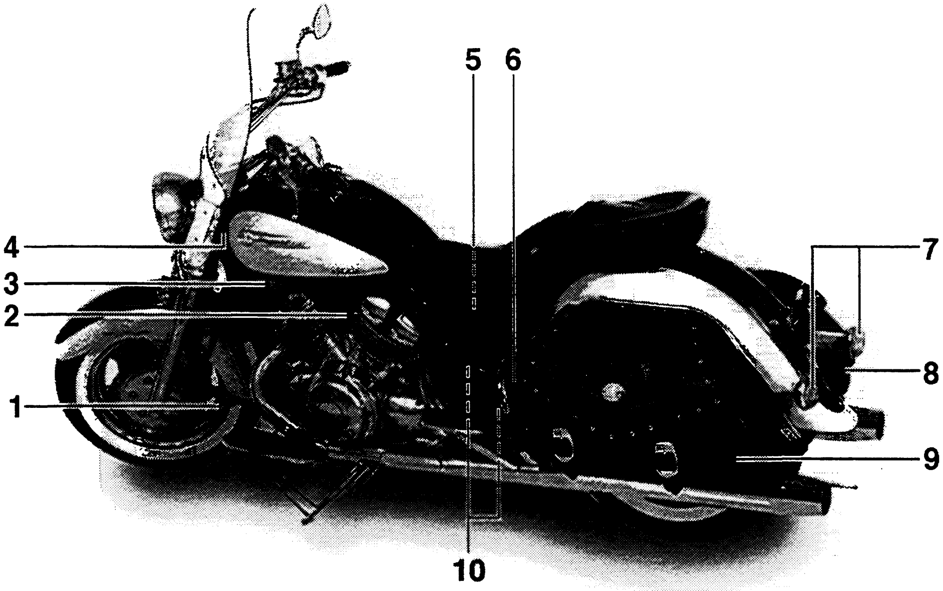
## Royal Star™
## XVZ13A(C) Right view



| | |
|---|---|
| 11. Passenger footrest | |
| 12. Main switch | (page 3-1) |
| 13. Passenger seat | |
| 14. Helmet holders | (page 3-11) |
| 15. Rider seat | (page 3-11) |
| 16. Fuel tank | (page 3-7) |
| 17. Fuel tank cap | (page 3-7) |
| 18. Headlight | (page 6-29) |
| 19. Front turn signal/position light | |
| 20. Rear brake pedal | (page 3-6) |
| 21. Rider footrest | |
| 22. Rear shock absorber adjusting nut | (page 3-16) |

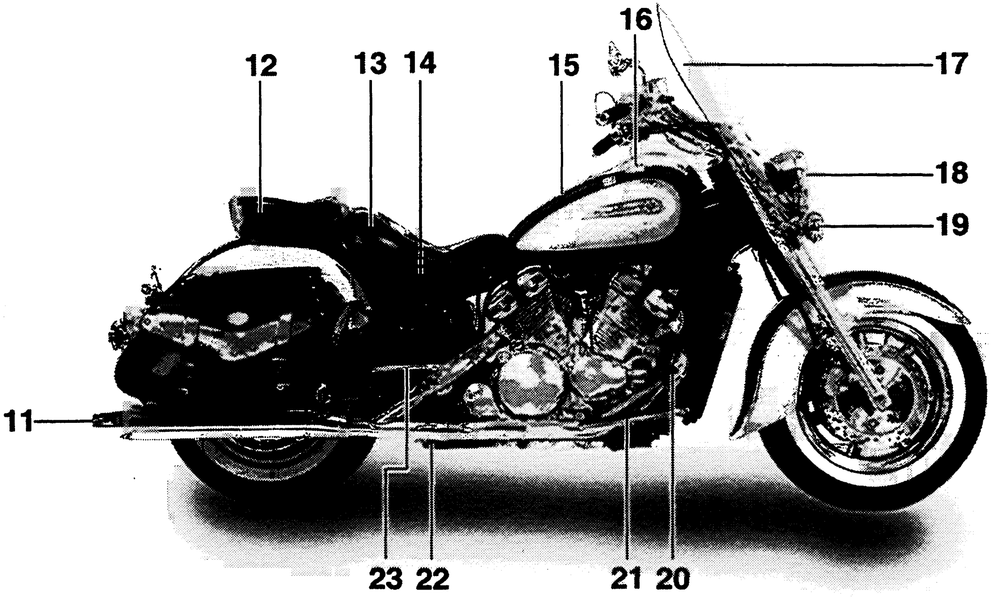
# DESCRIPTION

## Royal Star™Tour Classic™
## XVZ13AT(C) Left view



| | | | |
|---|---|---|---|
| 1. Shift pedal | (page 3-5) | 6. Seat lock | (page 3-11) |
| 2. Starter (choke) “\|↘\|” | (page 3-10) | 7. Rear turn signal lights | (page 6-30) |
| 3. Fuel cock | (page 3-9) | 8. Tail/brake light | (page 6-30) |
| 4. Steering lock | (page 3-10) | 9. Saddlebag | (page 3-14) |
| 5. Tool kit | (page 6-1) | 10. Fuses | (page 6-27) |

## Royal Star™Tour Classic™
## XVZ13AT(C) Right view



| | |
|---|---|
| 11. Muffler | |
| 12. Passenger seat | |
| 13. Rider seat | (page 3-11) |
| 14. Helmet holders | (page 3-11) |
| 15. Fuel tank | (page 3-7) |
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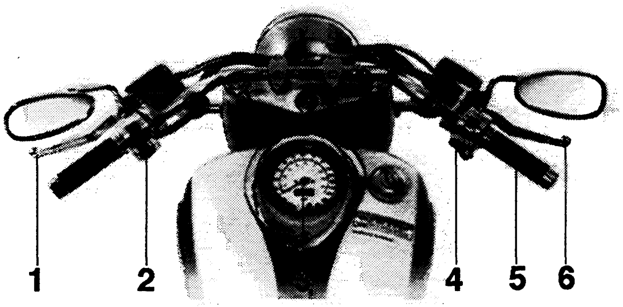
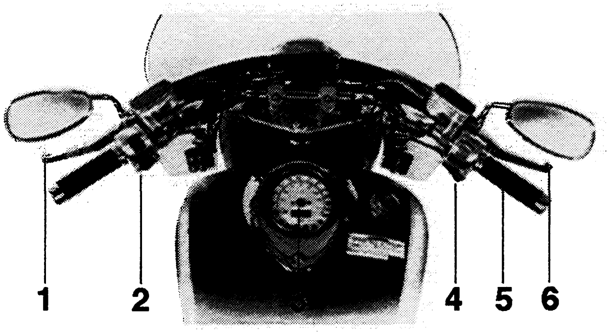
| 17. Windshield | (page 3-13) |
| 18. Headlight | (page 6-29) |
| 19. Front turn signal/position light | |
| 20. Rear brake pedal | (page 3-6) |
| 21. Rider footrest | |
| 22. Rear shock absorber adjusting nut | (page 3-16) |
| 23. Passenger footrest | |

## Royal Star™/Royal Star™ Tour Classic™ XVZ13A(C)/XVZ13AT(C) Controls/Instruments

XVZ13A(C)



XVZ13AT(C)



| | |
|---|---|
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| 4. Right handlebar switches | (page 3-5) |
| 5. Throttle grip | |
| 6. Front brake lever | (page 3-6) |

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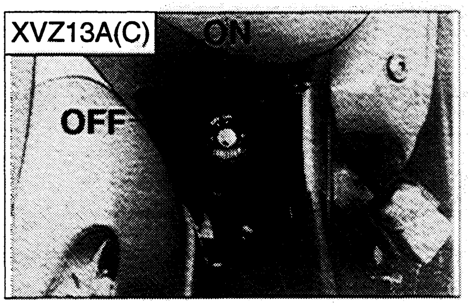
# INSTRUMENT AND CONTROL FUNCTIONS

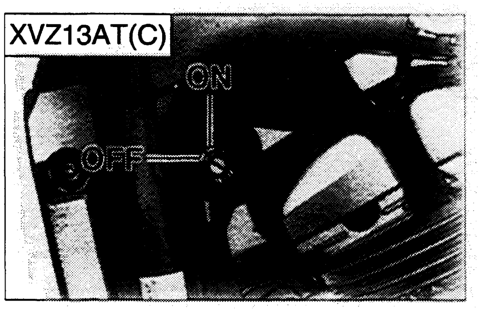


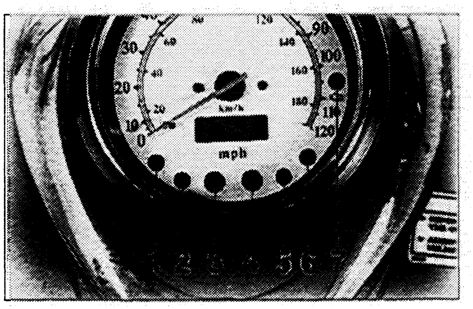
## Main switch

The main switch controls the ignition and lighting systems. Its operation is described below.

ON:
All electrical circuits are switched on, and the headlight, meter light, taillight, and front position lights come on. The engine can be started. The key cannot be removed in this position.

OFF:
All electrical circuits are switched off. The key can be removed in this position.





## Indicator lights

**1. High beam indicator light “≣D”**
This indicator comes on when the headlight high beam is used.

**2. Fuel level indicator light “⛽”**
When the fuel level drops below approximately 0.9 US gal (0.8 Imp gal, 3.5 L), this light will come on. When this light comes on, switch the fuel cock to “RES”. Then, fill the tank at the first opportunity.

**3. Neutral indicator light "N"**

This indicator comes on when the transmission is in neutral.

**4. Turn indicator light "⇦ ⇨"**

This indicator flashes when the turn switch is moved to the left or right.

**5. Oil level indicator light "🛢"**

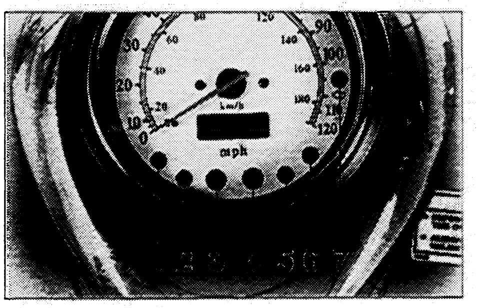
This indicator light will come on if the oil level is low. To check that the indicator light is working properly:

- Turn the engine stop switch to "↻" and the main switch to "ON".
- Put the transmission in neutral or apply the clutch lever.
- Push the start switch.

If the indicator light does not come on while pushing the start switch, have a Yamaha dealer inspect the electrical circuit.

**NOTE:**

Even if the oil is filled to the specified level, the indicator light may flicker when riding on a slope or during sudden acceleration or deceleration, but this is normal.



### 6. Engine overheat indicator light “🌡”

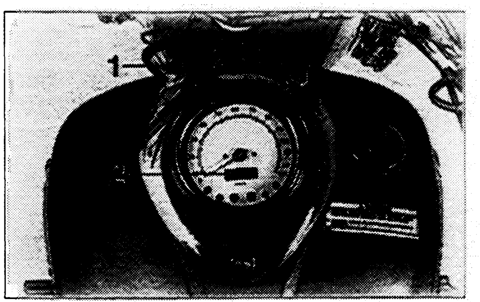
This indicator light will come on if the engine overheats. If the light comes on, stop the engine immediately and allow the engine to cool. To check that the indicator light is working properly:

- Turn the engine stop switch to “⟳” and the main switch to “ON”.
- Put the transmission in neutral or apply the clutch lever.
- Push the start switch.

If the indicator light does not come on while pushing the start switch, have a Yamaha dealer inspect the electrical circuit.

### 7. Overdrive / Engine trouble indicator light “O/D / 🔧”

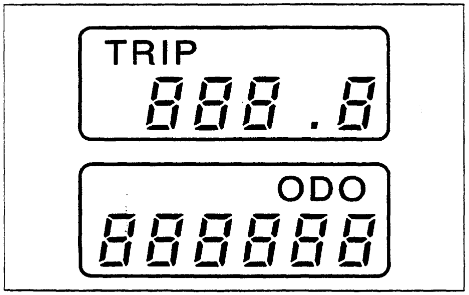
- This indicator light will come on when the transmission is in overdrive (5th gear).
- This indicator light will also come on or flash if trouble occurs in an engine monitoring circuit. In such a case, take the motorcycle to a Yamaha dealer to have the self-diagnostic systems checked.



1. Trip button
2. Odometer/Trip meter

## Speedometer

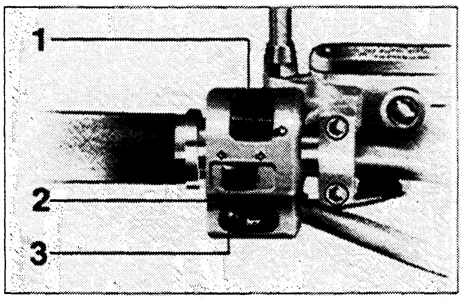
This speedometer is equipped with an odometer and a trip meter. Pushing the “TRIP” button will change the display from one to the other. When set to “ODO”, it indicates the motorcycle’s total mileage. When set to “TRIP”, it indicates the motorcycle’s mileage since the trip meter was last reset. Use the trip meter to estimate how far you can ride on a tank of fuel. This information will enable you to plan fuel stops in the future.



To reset the trip meter to “0”, push the “TRIP” button until it displays “TRIP”, then push it once again and hold it down for at least one second.

**NOTE:**

This motorcycle does not have a tachometer. However, it is equipped with an engine speed limiter, which prevents the engine speed from exceeding approximately 6,000 r/min and the vehicle from exceeding a top riding speed of approximately 112 mi/h (180 km/h).



## Handlebar switches

**1. Dimmer switch**

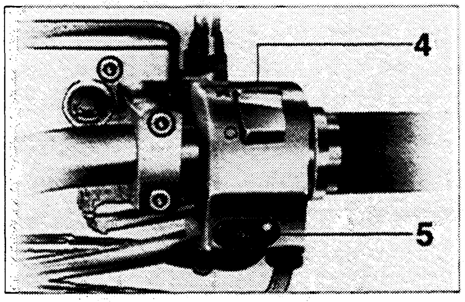
Turn the switch to “≣◯” for the high beam and to “≣◯” for the low beam.

**2. Turn signal switch “⇦ ⇨”**

This model is equipped with self-cancelling turn signals. To signal a right-hand turn, push the switch to the right. To signal a left-hand turn, push the switch to the left. Once the switch is released it will return to the center position. To cancel the signal, push the switch in after it has returned to the center position. If the switch is not cancelled by hand, it will self-cancel after the motorcycle has travelled at least 490 ft (150 m) and 15 seconds have passed. The self-cancelling mechanism only operates when the motorcycle is moving. Therefore the signal will not self-cancel while you are stopped at an intersection.

**3. Horn switch “📯”**

Press the switch to sound the horn.



### 4. Engine stop switch

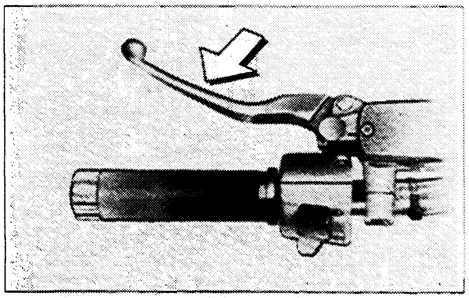
The engine stop switch is a safety device for use in an emergency such as when the motorcycle overturns or if trouble occurs in the throttle system. Turn the switch to "○" to start the engine. In case of emergency, turn the switch to "⊗" to stop the engine.

### 5. Start switch "⚡"

The starter motor cranks the engine when pushing the start switch.

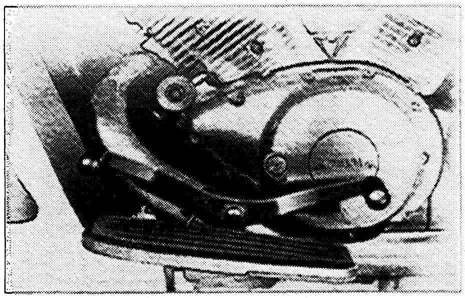
**CAUTION:**

**See starting instructions prior to starting the engine.**



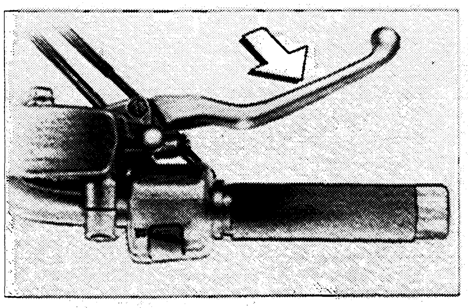
## Clutch lever

The clutch lever is located on the left handlebar, and the ignition circuit cut-off system is incorporated in the clutch lever holder. Pull the clutch lever to the handlebar to disengage the clutch, and release the lever to engage the clutch. The lever should be pulled rapidly and released slowly for smooth clutch operation. (Refer to the engine starting procedures for a description of the ignition circuit cut-off system.)



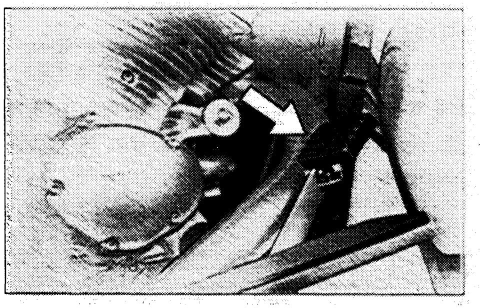
## Shift pedal

The shift pedal is located on the left side of the engine and is used in combination with the clutch when shifting. Use your toe or heel to shift up and your toe to shift down.



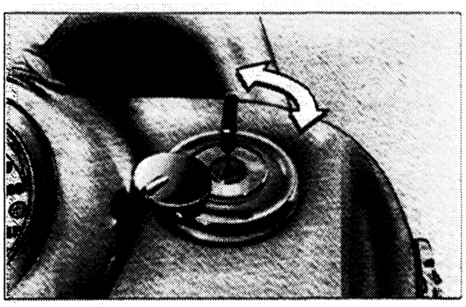
## Front brake lever

The front brake lever is located on the right handlebar. Pull it toward the handlebar to apply the front brake.



## Rear brake pedal

The rear brake pedal is on the right side of the motorcycle. Press down on the brake pedal to apply the rear brake.



## Fuel tank cap

### To remove

Slide the cover open, insert the key and turn it 1/4 turn clockwise. The lock will be released and the cap can be removed.

### To install

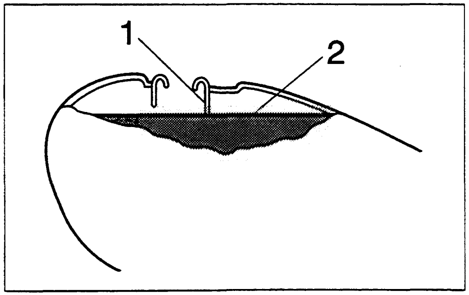
Make sure the arrow mark on the tank cap is facing forward, then push the tank cap into position. Turn the key counterclockwise to the original position and remove it. Close the lock cover.

**NOTE:**

This tank cap cannot be closed unless the key is in the lock. The key cannot be removed if the cap is not locked properly.

**⚠ WARNING**

**Be sure the cap is properly installed and locked in place before riding the motorcycle.**



1. Filler tube
2. Fuel level

## Fuel

Make sure there is sufficient fuel in the tank. Fill the fuel tank to the bottom of the filler tube as shown in the illustration.

**⚠ WARNING**

**Do not overfill the fuel tank. Avoid spilling fuel on the hot engine. Do not fill the fuel tank above the bottom of the filler tube or it may overflow when the fuel heats up later and expands.**

**CAUTION:**

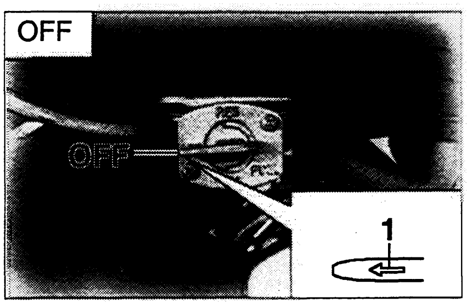
**Always wipe off spilled fuel immediately with a dry and clean soft cloth. Fuel may deteriorate painted surfaces or plastic parts.**

Recommended fuel:
  UNLEADED FUEL
Fuel tank capacity:
  Total:
    4.8 US gal (4.0 Imp gal, 18 L)
  Reserve:
    0.9 US gal (0.8 Imp gal, 3.5 L)

Your Yamaha engine has been designed to use regular unleaded gasoline with a pump octane number ([R+M]/2) of 86 or higher, or research octane number of 91 or higher. If knocking or pinging occurs, use a different brand of gasoline or premium unleaded fuel. Unleaded fuel will give you longer spark plug life and reduced maintenance cost. If unleaded gasoline is not available, then leaded regular gasoline can be used.

### Gasohol

There are two types of gasohol; gasohol containing ethanol and that containing methanol. Gasohol containing ethanol can be used if ethanol content does not exceed 10%. Gasohol containing methanol is not recommended by Yamaha because it can cause fuel system damage or vehicle performance problems.



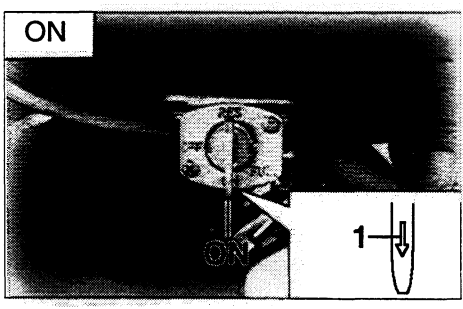
1. Arrow mark

## Fuel cock

The fuel cock supplies fuel from the tank to the carburetors while filtering it also.

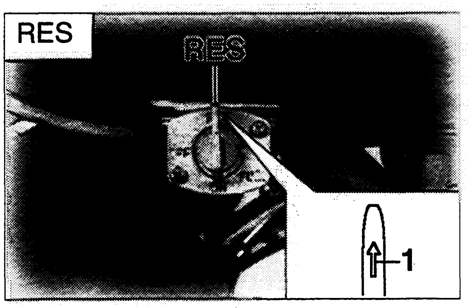
The fuel cock has three positions:

OFF: With the fuel cock in this position, fuel will not flow. Always set the fuel cock to this position when the engine is not running.



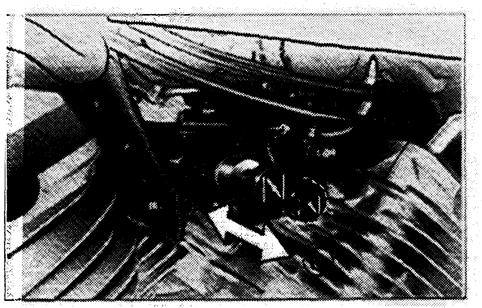
1. Arrow mark

ON: With the fuel cock in this position, fuel flows to the carburetors. Set the fuel cock to this position when starting the engine and while riding.



1. Arrow mark

RES: This indicates reserve. If you run out of fuel while riding, move the fuel cock to this position. Fill the tank at the first opportunity. Be sure to set the fuel cock back to "ON" after refueling!

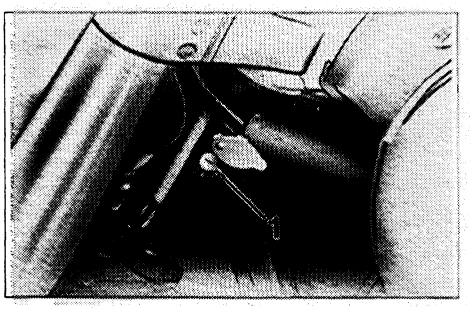


## Starter (choke) “|↘|”

Starting a cold engine requires a richer air-fuel mixture. A separate starter circuit supplies this mixture.

Move in direction ⓐ to turn on the starter (choke).

Move in direction ⓑ to turn off the starter (choke).



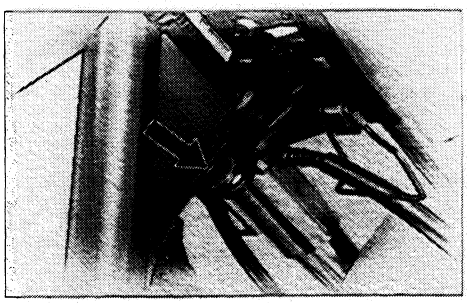
1. Steering lock

## Steering lock

The steering lock is located on the left side of the head pipe.

To lock the steering:

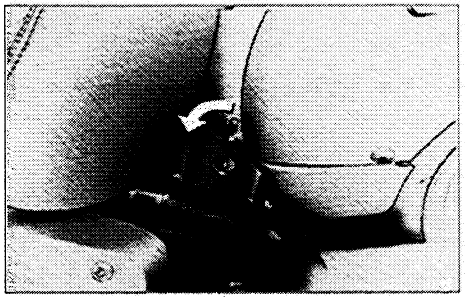
- Turn the handlebars all the way to the right.
- Open the steering lock cover.
- Insert the key and turn it counterclockwise 1/8 turn.
- Push the key in and turn it back 1/8 turn clockwise.
- Check that the steering is locked.
- Remove the key and close the steering lock cover.



To unlock the steering:

- Open the steering lock cover.
- Insert the key, turn it counterclockwise 1/8 turn, and let go of it. (It automatically moves to where it can be removed.)
- Remove the key and close the steering lock cover.

On the right side of the headpipe, there is also a place to lock the steering with a padlock. Turn the handlebars to align the holes in the two brackets and lock the steering with a suitable padlock.

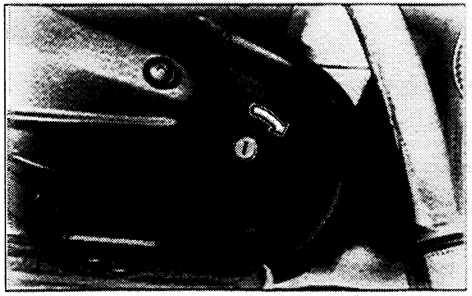


## Rider seat [XVZ13A(C)]

The rider seat lock is located behind the rider seat on the left side. To open the seat, insert the key in the seat lock and turn it counterclockwise. Then, remove the seat. To reinstall the seat, insert the projection on the front of the seat into the seat holder on the frame, then push down on the rear of the seat. Turn the key to the center position and remove it.

**NOTE:**

Make sure that the seat is securely fitted.



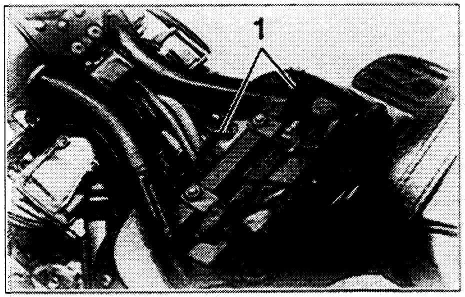
## Rider seat [XVZ13AT(C)]

The rider seat lock is located below the rider seat on the left side. To open the seat, insert the key in the seat lock and turn it clockwise. Then, remove the seat.

To reinstall the seat, insert the projection on the front of the seat into the seat holder on the frame, then push down on the rear of the seat. Turn the key to the center position and remove it.

**NOTE:**

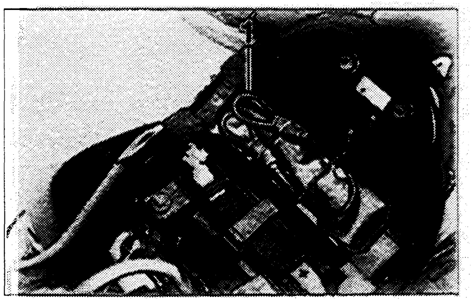
Make sure that the seat is securely fitted.



1. Helmet holder (× 2)

## Helmet holders

There are two helmet holders under the rider's seat. To secure a helmet on the right side holder, simply hook the buckle of the helmet strap over the holder and close the seat securely.

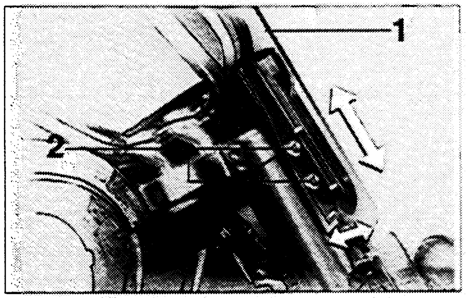


1. Helmet holding cable

To secure a helmet on the left side holder, use the helmet holding cable located beside the tool kit. Pass the cable through the buckle on the helmet strap, then place both cable loops over the holder and close the seat securely.

**⚠ WARNING**

**Never ride with a helmet secured in the seat lock. The helmet may hit objects, causing loss of control and possibly an accident.**



1. Windshield
2. Bolt (× 4)

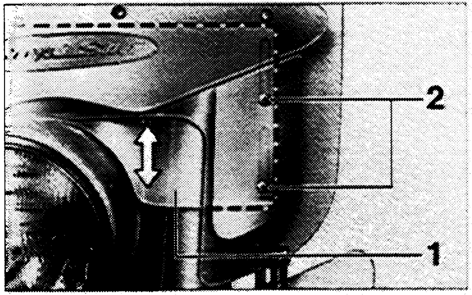
## Windshield [XVZ13AT(C)]

The windshield height and angle can be adjusted to suit the rider's preference.

**WARNING**

- **Tighten the windshield bolts securely after adjustment.**
- **After adjusting, turn the handlebars to the left and right making sure there is no obstruction and that the windshield does not contact any other parts, etc.**
- **Open the throttle and make sure it returns properly when released. Otherwise an accident or injury could result.**

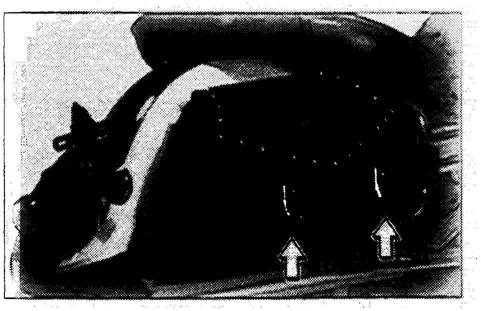
ANGLE ADJUSTMENT:
Loosen the bolts on each side of the windshield. Move the windshield to the desired position, then be sure to tighten the bolts to the specified torque.
HEIGHT ADJUSTMENT:
There are two height positions. To change the height:



1. Headlight cover
2. Screw (× 4)

1. Remove the bolts on each side of the windshield. Move the windshield to the desired position and reinstall the bolts. Be sure to tighten the bolts to the specified torque.
2. Loosen the screws which hold the headlight cover. Position the cover so it will fit close to the headlight without touching it. Retighten the screws.

Tightening torque:
Windshield bolts:
12 ft·lb (1.6 m·kg, 16 Nm)



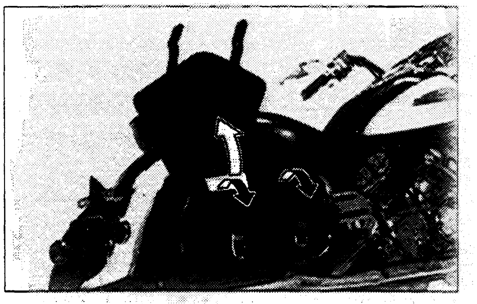
## Saddlebags [XVZ13AT(C)]

To open:

1. Unbuckle the belts and fold up the outside flap.
2. Open the zippers and fold out the inside flap.

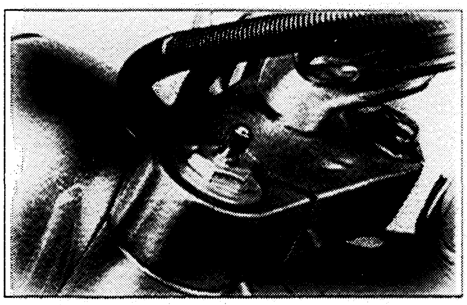
To close:

1. Fold the inside flap in and close the zippers.
2. Fold the outside flap down and buckle both belts securely. For saddlebag cleaning and care, see page 7-3.



**⚠ WARNING**

- **Always be sure to close and lock each saddlebag securely before operating the motorcycle.**
- **Distribute weight evenly on each side of the motorcycle.**
- **Never exceed the maximum loading limit of 11 lb (5 kg) in each saddlebag. Improper loading or overloading can cause vehicle handling problems leading to an accident or personal injury.**



1. Air valve

## Adjusting front fork preload

Each fork leg is equipped with an air valve to adjust the spring preload. The spring preload is adjusted by changing the air pressure in each fork leg.

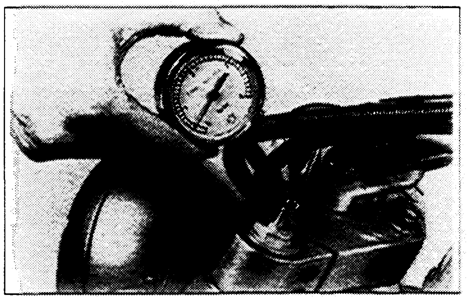
Increasing the air pressure increases the spring preload, decreasing air pressure decreases spring preload. Special equipment is required to adjust the air pressure in the front fork. Have your Yamaha dealer make this adjustment.

**NOTE:**

In order to check or adjust the air pressure, the motorcycle must be elevated so the front wheel is not in contact with the ground.

**⚠ WARNING**

**Each fork leg must be set to the same pressure. Uneven setting can cause poor handling and loss of stability.**



Minimum/standard air pressure setting:

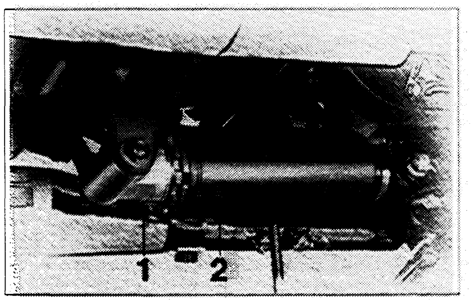
Zero

Maximum air pressure setting:

7.11 psi (0.50 kgf/cm$^2$, 50 kPa)

**CAUTION:**

**Never exceed the maximum pressure, or oil seal damage may occur.**

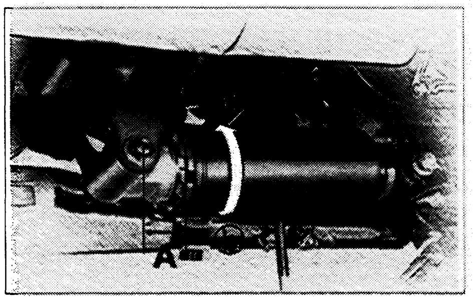


1. Locknut
2. Adjusting nut

## Adjusting rear shock absorber preload

This shock absorber is equipped with a spring preload adjusting nut. Use the special wrench located in the owner's tool kit to adjust the spring preload.

1. Loosen the locknut.
2. Turn the adjusting nut in direction ⓐ to increase spring preload and in direction ⓑ to decrease spring preload.

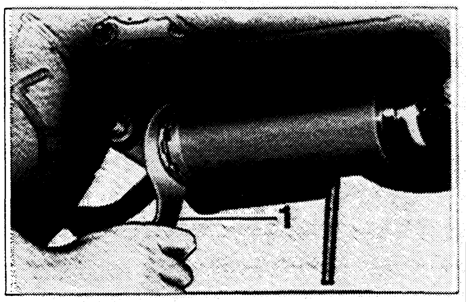


A. Spring set length "A"

Spring preload:
Minimum (hard):
"A" = 1.59 in (40.5 mm)
Standard:
"A" = 1.79 in (45.5 mm)
Maximum (soft):
"A" = 1.91 in (48.5 mm)

**CAUTION:**

**Never attempt to turn an adjuster beyond the maximum or minimum setting.**



1. Special wrench

3. Tighten the locknut to the specified torque.

Tightening torque:
Locknut:
18 ft·lb (2.5 m·kg, 25 Nm)

**CAUTION:**

**Always tighten the locknut against the spring adjusting nut and tighten the locknut to the specified torque.**

**⚠ WARNING**

**This shock absorber contains highly pressurized nitrogen gas. Read and understand the following information before handling the shock absorber. The manufacturer cannot be held responsible for property damage or personal injury that may result from improper handling.**

- **Do not tamper with or attempt to open the cylinder assembly.**
- **Do not subject the shock absorber to an open flame or other high heat source. This may cause the unit to explode due to excessive gas pressure.**
- **Do not deform or damage the cylinder in any way. Cylinder damage will result in poor damping performance.**
- **Take your shock absorber to a Yamaha dealer for any service.**

## Sidestand

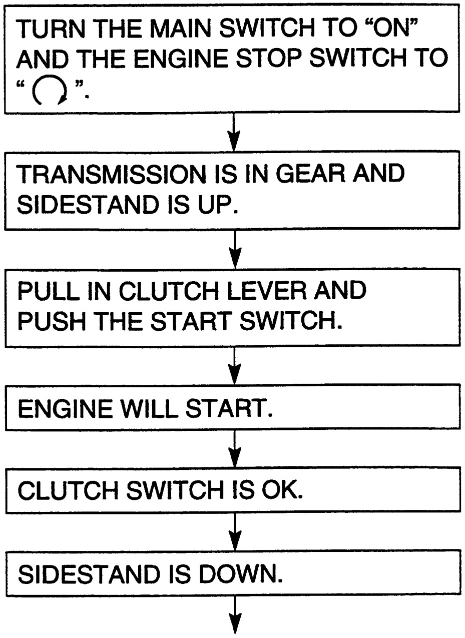
This model is equipped with an ignition circuit cut-off system. The motorcycle must not be ridden when the sidestand is down. The sidestand is located on the left side of the frame. (Refer to page 5-1 for an explanation of this system.)

**⚠ WARNING**

**This motorcycle must not be operated with the sidestand in the down position. If the stand is not properly retracted, it could contact the ground and distract the operator, resulting in a possible loss of control. Yamaha has designed into this motorcycle a lockout system to assist the operator in fulfilling the responsibility of retracting the sidestand. Please check carefully the operating instructions listed below and if there is any indication of a malfunction, return the motorcycle to a Yamaha dealer immediately for repair.**

## Sidestand/clutch switch operation check

Check the operation of the sidestand switch and clutch switch against the information below.



TURN THE MAIN SWITCH TO “ON” AND THE ENGINE STOP SWITCH TO “⟳”.

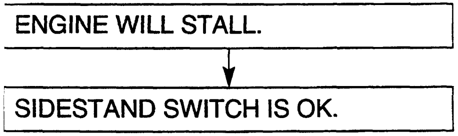
TRANSMISSION IS IN GEAR AND SIDESTAND IS UP.

PULL IN CLUTCH LEVER AND PUSH THE START SWITCH.

ENGINE WILL START.

CLUTCH SWITCH IS OK.

SIDESTAND IS DOWN.


ENGINE WILL STALL.
SIDESTAND SWITCH IS OK.

**⚠ WARNING**

**If improper operation is noted, consult a Yamaha dealer immediately.**

# PRE-OPERATION CHECKS

Pre-operation check list........................................................................ 4-1

# PRE-OPERATION CHECKS

Owners are personally responsible for their vehicle's condition. Your motorcycle's vital functions can start to deteriorate quickly and unexpectedly, even if it remains unused (for instance, if it is exposed to the elements). Any damage, fluid leak or loss of tire pressure could have serious consequences. Therefore, it is very important that, in addition to a thorough visual inspection, you check the following points before each ride.

## PRE-OPERATION CHECK LIST

| ITEM | CHECKS | PAGE |
|---|---|---|
| **Front brake** | • Check operation, fluid level and vehicle for fluid leakage.<br>• Fill with DOT 4 brake fluid if necessary. | 6-19 ~ 6-24 |
| **Rear brake** | • Check operation, fluid level and vehicle for fluid leakage.<br>• Fill with DOT 4 brake fluid if necessary. | |
| **Clutch** | • Check operation, fluid level and vehicle for fluid leakage.<br>• Fill with DOT 4 brake fluid if necessary. | 6-18 |
| **Throttle grip and housing** | • Check for smooth operation.<br>• Lubricate if necessary. | 6-14 |
| **Engine oil** | • Check oil level.<br>• Fill with oil if necessary. | 6-10 ~ 6-12 |
| **Coolant reservoir tank** | • Check coolant level.<br>• Fill with coolant if necessary. | 6-13 |
| **Final gear oil** | • Check vehicle for leakage. | 6-12 |
| **Wheels and tires** | • Check tire pressure, wear and for damage. | 6-15 ~ 6-17 |
| **Brake and shift pedal shafts** | • Check for smooth operation.<br>• Lubricate if necessary. | 6-23 |
| **Brake and clutch lever pivots** | • Check for smooth operation.<br>• Lubricate if necessary. | 6-23 |
| **Sidestand pivot** | • Check for smooth operation.<br>• Lubricate if necessary. | 6-24 |

| ITEM | CHECKS | PAGE |
|---|---|---|
| **Chassis fasteners** | • Make sure that all nuts, bolts and screws are properly tightened.<br>• Tighten if necessary. | — |
| **Fuel tank** | • Check fuel level.<br>• Fill with fuel if necessary. | 3-7 ~ 3-8 |
| **Lights, signals and switches** | • Check for proper operation. | 6-29 ~ 6-30 |

**NOTE:**

Pre-operation checks should be made each time the motorcycle is used. Such an inspection can be thoroughly accomplished in a very short time; and the added safety it assures is more than worth the time involved.

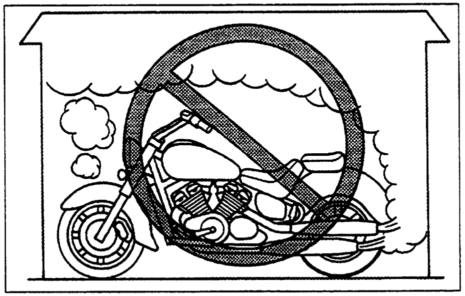
**⚠ WARNING**

- **If any item in the PRE-OPERATION CHECK is not working properly, have it inspected and repaired before operating the motorcycle.**
- **The engine, exhaust system will be very hot after the engine has been run. Be careful not to touch them or to allow any clothing item to contact them during inspection or repair.**

# OPERATION AND IMPORTANT RIDING POINTS

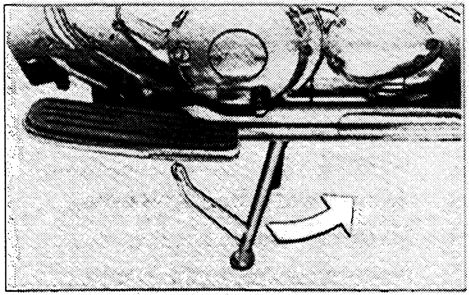
Starting and warming up a cold engine .......... 5-1
Starting a warm engine .......... 5-3
Shifting .......... 5-4
To start out and accelerate .......... 5-5
To decelerate .......... 5-5
Recommended shift point .......... 5-6
Engine break-in .......... 5-6
Parking .......... 5-7

# OPERATION AND IMPORTANT RIDING POINTS



**⚠ WARNING**

- **Before riding this motorcycle, become thoroughly familiar with all operating controls and their functions. Consult a Yamaha dealer regarding any control or function that you do not thoroughly understand.**
- **Never start your engine or let it run for any length of time in a closed area. The exhaust fumes are poisonous and can cause loss of consciousness and death within a short time. Always operate your motorcycle in an area with adequate ventilation.**



- **Before starting out, always be sure the sidestand is up. Failure to retract the sidestand completely can result in a serious accident when you try to turn a corner.**

**CAUTION:**

- **Be careful where you store personal items on the motorcycle. Avoid blocking the air cleaner intake or performance will suffer.**
- **Be careful not to put anything near the battery and its terminals. Electrical failure and acid corrosion may result.**

## Starting and warming up a cold engine

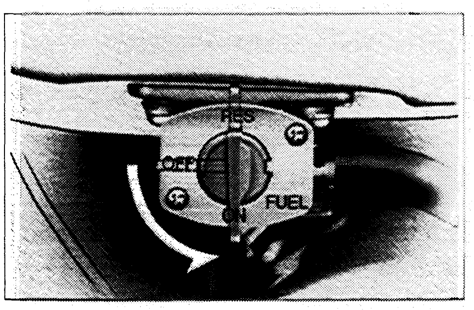
**NOTE:**

This motorcycle is equipped with an ignition circuit cut-off system.

The engine can be started only under the following conditions:

- The transmission is in neutral.
- The sidestand is up, the transmission is in gear and the clutch is disengaged.

The motorcycle must not be ridden when the sidestand is down.



**⚠ WARNING**

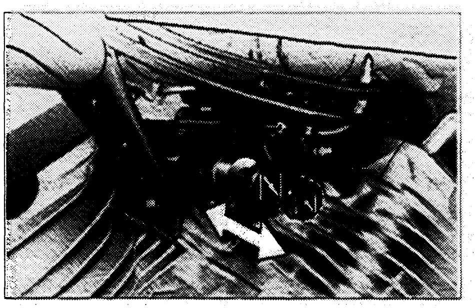
**Before going through the following steps, check the function of the sidestand switch and clutch switch. (Refer to page 3-17.)**

1. Turn the fuel cock to "ON".
2. Turn the main switch to "ON" and the engine stop switch to "↻".

**CAUTION:**

**If the fuel indicator light comes on, check the fuel level. If necessary, fill the tank with fuel.**

3. Shift the transmission into neutral.



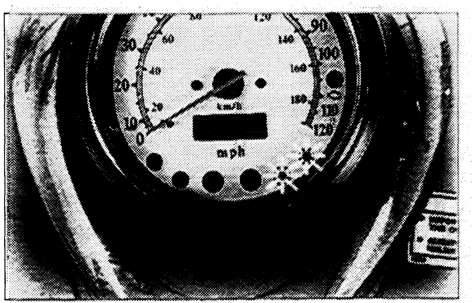
**NOTE:**

When the transmission is in neutral, the neutral indicator light should be on. If the light does not come on, ask a Yamaha dealer to inspect it.

4. Turn on the starter (choke) and completely close the throttle grip.
5. Start the engine by pushing the start switch.

**NOTE:**

If the engine fails to start, release the start switch, wait a few seconds, then try again. Each attempt should be as short as possible to preserve the battery. Do not crank the engine more than 10 seconds on any one attempt.



**CAUTION:**

**The oil level indicator light and engine overheat indicator light should come on when the start switch is pushed and should go off when the start switch is released. If the oil level indicator light flickers or remains on, immediately stop the engine and check the engine oil level and for oil leakage. If necessary, fill the engine with oil and check to see that the oil level indicator light goes off. If not, consult a Yamaha dealer.**

6. After starting the engine, move the starter (choke) back to the half-open position.

**NOTE:**

For maximum engine life, always warm up the engine before starting off. Never accelerate hard with a cold engine.

7. After warming up the engine, turn off the starter (choke) completely.

**NOTE:**

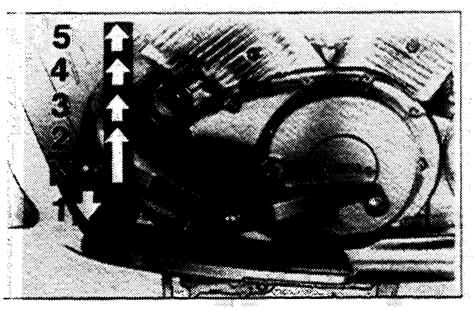
The engine is warm when it responds normally to the throttle with the starter turned off. To avoid the possibility of excessive exhaust emissions, never leave the starter circuit on longer than necessary. The length of time the starter is needed depends upon the ambient temperature. Warm ambient temperatures (above 10°C/50°F) require about 7 seconds of starter use. Cold ambient temperatures (below 10°C/50°F) require about 35 seconds with the starter fully open, then about 2.5 minutes with the starter in the half-open position. For maximum engine life, always warm up the engine before starting off. Never accelerate hard with a cold engine.

## Starting a warm engine

The starter (choke) is not required when the engine is warm.

**CAUTION:**

**See the "Engine break-in" section prior to operating the motorcycle for the first time.**



## Shifting

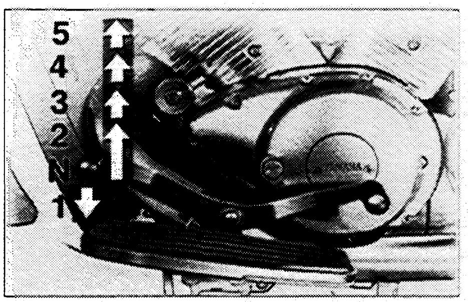
The transmission lets you control the amount of power you have available at a given speed for starting, accelerating, climbing hills, etc. The use of the shift pedal is shown in the illustration.

To shift into neutral, depress the shift pedal repeatedly until it reaches the end of its travel, then raise the pedal slightly.

**CAUTION:**

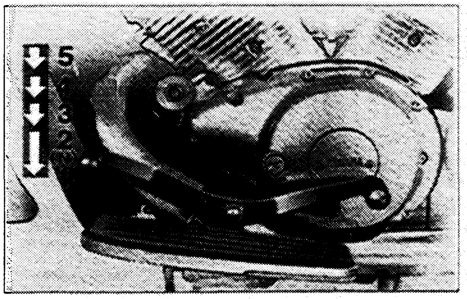
- **Do not coast for long periods with the engine off, and do not tow the motorcycle a long distance. Even with gears in neutral, the transmission is only properly lubricated when the engine is running. Inadequate lubrication may damage the transmission.**
- **Always use the clutch when changing gears. The engine, transmission, and driveline are not designed to withstand the shock of forced shifting and can be damaged by shifting without using the clutch.**

# OPERATION AND IMPORTANT RIDING POINTS



## To start out and accelerate:

1. Pull the clutch lever to disengage the clutch.
2. Shift into first gear. The neutral indicator light should go out.
3. Open the throttle gradually, and at the same time, release the clutch lever slowly.
4. At the recommended shift point in the table on page 5-6, close the throttle, and at the same time, quickly pull in the clutch lever.
5. Shift into second gear. (Be careful not to shift into neutral.)
6. Open the throttle part way and gradually release the clutch lever.
7. Follow the same procedure when shifting to the next higher gear. Always shift gears at the recommended shift points.

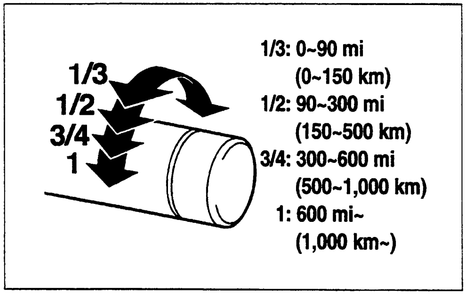


## To decelerate:

1. Apply both the front and the rear brakes at the same time to slow the motorcycle.
2. When the motorcycle reaches 16 mi/h (25 km/h), shift into first gear. Any time the engine is about to stall or runs very roughly, pull in the clutch and use the brakes to stop.
3. When the motorcycle is almost completely stopped, shift into neutral. The neutral indicator light should come on.

## Recommended shift point

| | Acceleration shift point mi/h (km/h) | Deceleration shift point mi/h (km/h) |
|---|---|---|
| 1st → 2nd | 13 (20) | 16 (25) |
| 2nd → 3rd | 19 (30) | 16 (25) |
| 3rd → 4th | 25 (40) | 16 (25) |
| 4th → 5th | 31 (50) | 16 (25) |



## Engine break-in

There is never a more important period in the life of your motorcycle than the period between zero and 600 mi (1,000 km). For this reason we ask that you carefully read the following material. Because the engine is brand new, you must not put an excessive load on it for the first 600 mi (1,000 km). The various parts in the engine wear and polish themselves to the correct operating clearances. During this period, prolonged full throttle operation, or any condition which might result in excessive heating of the engine, must be avoided.

### 0 ~ 90 mi (0 ~ 150 km)

Avoid operation above 1/3 throttle. Stop the engine and let it cool for 5 to 10 minutes after every hour of operation. Vary the speed of the motorcycle from time to time. Do not operate it at one set throttle position.

### 90 ~ 300 mi (150 ~ 500 km)

Avoid prolonged operation above 1/2 throttle. Rev the motorcycle freely through the gears, but do not use full throttle at any time.

### 300 ~ 600 mi (500 ~ 1,000 km)

Avoid cruising speeds in excess of 3/4 throttle.

**CAUTION:**

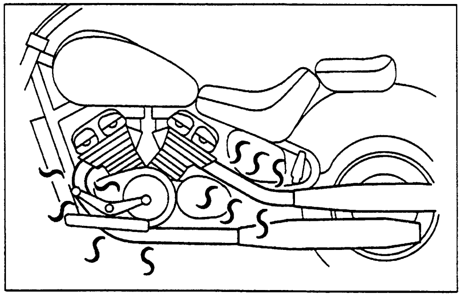
**After 600 mi (1,000 km) of operation, be sure to replace the engine oil, oil filter and final gear oil.**

**600 mi (1,000 km) and beyond**

Avoid prolonged full-throttle operation. Vary speed occasionally.

**CAUTION:**

**If any engine trouble should occur during the break-in period, consult a Yamaha dealer immediately.**



## Parking

When parking the motorcycle, stop the engine and remove the ignition key. Turn the fuel cock to "OFF" whenever stopping the engine.

**⚠ WARNING**

**The exhaust system is hot. Park the motorcycle in a place where pedestrians or children are not likely to touch the motorcycle. Do not park the motorcycle on a slope or soft ground; the motorcycle may overturn.**

# PERIODIC MAINTENANCE AND MINOR REPAIR

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# PERIODIC MAINTENANCE AND MINOR REPAIR

Periodic inspection, adjustment, and lubrication will keep your motorcycle in the safest and most efficient condition possible. Safety is an obligation of the motorcycle owner. The most important points of motorcycle inspection, adjustment, and lubrication are explained in the following pages.

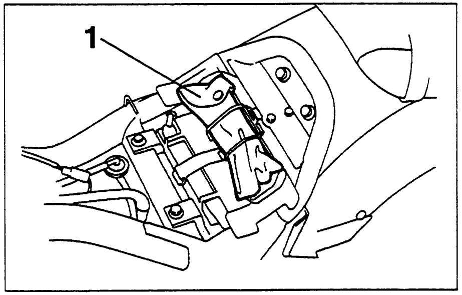
**"Maintenance, replacement, or repair of the emission control devices and systems may be performed by any repair establishment or individual using any part which is certified (if applicable)".**

**⚠ WARNING**

**If you are not familiar with motorcycle service, this work should be done by a Yamaha dealer.**

## PERIODIC MAINTENANCE

PROPER PERIODIC MAINTENANCE OF YOUR MOTORCYCLE IS IMPORTANT IN ORDER TO ENJOY LONG, PLEASURABLE SERVICE. ESPECIALLY IMPORTANT ARE THE MAINTENANCE SERVICES RELATED TO EMISSIONS CONTROL. THESE CONTROLS NOT ONLY FUNCTION TO ENSURE CLEANER AIR BUT ARE ALSO VITAL TO PROPER ENGINE OPERATION AND MAXIMUM PERFORMANCE. IN THE FOLLOWING TABLES OF PERIODIC MAINTENANCE, THE SERVICES RELATED TO EMISSIONS CONTROL ARE GROUPED SEPARATELY. THESE SERVICES REQUIRE SPECIALIZED DATA, KNOWLEDGE, AND EQUIPMENT. YAMAHA DEALERS ARE TRAINED AND EQUIPPED TO PERFORM THESE PARTICULAR SERVICES.



1. Tool kit

### Tool kit

The service information included in this manual is intended to provide you, the owner, with the necessary information for completing some of your own preventive maintenance and minor repairs. The tools provided in the owner's tool kit are to assist you in the performance of periodic maintenance. However, some other tools such as a torque wrench are also necessary to perform the maintenance correctly.

**NOTE:**

If you do not have necessary tools required during a service operation, take your motorcycle to a Yamaha dealer for service.

**⚠ WARNING**

**Modifications to this motorcycle not approved by Yamaha may cause loss of performance, excessive emissions, and render it unsafe for use. Consult a Yamaha dealer before attempting any changes.**

## PERIODIC MAINTENANCE CHART FOR EMISSION CONTROL SYSTEM

| No. | | ITEM | ROUTINE | INITIAL | ODOMETER READINGS | | | | |
|---|---|---|---|---|---|---|---|---|---|
| | | | | 600 mi (1,000 km) or 1 month | 4,000 mi (7,000 km) or 6 months | 8,000 mi (13,000 km) or 12 months | 12,000 mi (19,000 km) or 18 months | 16,000 mi (25,000 km) or 24 months | 20,000 mi (31,000 km) or 30 months |
| 1 | * | **Valve clearance** | • Check and adjust valve clearance when engine is cold. | **Every 26,600 mi (42,000 km)** | | | | | |
| 2 | | **Spark plug** | • Check condition.<br>• Adjust gap and clean.<br>• Replace at 8,000 mi (13,000 km) or 12 months and thereafter every 8,000 mi (13,000 km) or 12 months. | | √ | **Replace** | √ | **Replace** | √ |
| 3 | * | **Crankcase ventilation system** | • Check ventilation hose for cracks or damage.<br>• Replace if necessary. | | √ | √ | √ | √ | √ |
| 4 | * | **Fuel line** | • Check fuel hose for cracks or damage.<br>• Replace if necessary. | | √ | √ | √ | √ | √ |
| 5 | * | **Fuel filter** | • Replace initial 20,000 mi (31,000 km) and thereafter every 20,000 mi (31,000 km). | | | | | | **Replace** |
| 6 | * | **Exhaust system** | • Check for leakage.<br>• Retighten if necessary.<br>• Replace gasket(s) if necessary. | | √ | √ | √ | √ | √ |
| 7 | * | **Carburetor synchronization** | • Adjust synchronization of carburetors. | √ | √ | √ | √ | √ | √ |
| 8 | * | **Idle speed** | • Check and adjust engine idle speed.<br>• Adjust cable free play. | √ | √ | √ | √ | √ | √ |
| 9 | * | **Evaporative Emission control system (For California only)** | • Check control system for damage.<br>• Replace if necessary. | | | | √ | | √ |

*** Since these items require special tools, data and technical skills, they should be serviced by a Yamaha dealer.**

**NOTE:**

For odometer readings or time periods higher than 20,000 mi (31,000 km) or 30 months, repeat the same maintenance as listed in the chart from the 4,000 mi (7,000 km) or 6 month interval.

## GENERAL MAINTENANCE AND LUBRICATION CHART

| No. | | ITEM | ROUTINE | TYPE | INITIAL | ODOMETER READINGS | | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| | | | | | 600 mi (1,000 km) or 1 month | 4,000 mi (7,000 km) or 6 months | 8,000 mi (13,000 km) or 12 months | 12,000 mi (19,000 km) or 18 months | 16,000 mi (25,000 km) or 24 months | 20,000 mi (31,000 km) or 30 months |
| 1 | | **Engine oil** | • Replace | See page 6-10. | √ | | √ | | √ | |
| 2 | * | **Oil filter** | • Replace | - | √ | | √ | | √ | |
| 3 | * | **Air filter (See NOTE.)** | • Clean with compressed air.<br>• Replace if necessary. | - | | √ | √ | √ | √ | √ |
| 4 | * | **Cooling system** | • Check hoses for cracks or damage, replace if necessary. | - | | √ | √ | √ | √ | √ |
| | | | • Replace coolant every 24 months. | Ethylene glycol antifreeze coolant | | | | | **Replace** | |
| 5 | * | **Brake system** | • Adjust free play.<br>• Check and replace pads if necessary. | - | √ | √ | √ | √ | **Replace brake fluid** | √ |
| 6 | * | **Clutch** | • Check operation and fluid leakage. (See NOTE page 6-7.)<br>• Correct if necessary. | - | √ | √ | √ | √ | √ | √ |
| 7 | * | **Final gear oil** | • Check vehicle for leakage.<br>• Replace every 16,000 mi (25,000 km) or 24 months. | SAE 80 API "GL-4" hypoid gear oil | **Replace** | | **Check** | | **Replace** | |
| 8 | * | **Control cable** | • Apply chain lube thoroughly. | Yamaha chain and cable lube or SAE 10W30 motor oil | √ | √ | √ | √ | √ | √ |
| 9 | * | **Rear arm pivot bearing** | • Check bearing assembly for looseness.<br>• Moderately repack every 16,000 mi (25,000 km). | Medium weight wheel bearing grease | | | √ | | **Repack** | |

| No. | | ITEM | ROUTINE | TYPE | INITIAL | ODOMETER READINGS | | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| | | | | | 600 mi (1,000 km) or 1 month | 4,000 mi (7,000 km) or 6 months | 8,000 mi (13,000 km) or 12 months | 12,000 mi (19,000 km) or 18 months | 16,000 mi (25,000 km) or 24 months | 20,000 mi (31,000 km) or 30 months |
| 10 | | **Brake/ Clutch lever pivot shaft** | • Apply chain lube lightly. | Yamaha chain and cable lube or SAE 10W30 motor oil | | √ | √ | √ | √ | √ |
| 11 | | **Brake pedal and shift pedal shaft** | • Lubricate<br>• Apply chain lube lightly. | Yamaha chain and cable lube or SAE 10W30 motor oil | | √ | √ | √ | √ | √ |
| 12 | * | **Sidestand pivot** | • Check operation and lubricate.<br>• Apply chain lube lightly. | Yamaha chain and cable lube or SAE 10W30 motor oil | | √ | √ | √ | √ | √ |
| 13 | * | **Sidestand switch** | • Check and clean or replace if necessary. | - | √ | √ | √ | √ | √ | √ |
| 14 | * | **Front fork** | • Check operation and for leakage. | - | | √ | √ | √ | √ | √ |
| 15 | * | **Steering bearings** | • Check bearing assembly for looseness.<br>• Moderately repack every 16,000 mi (25,000 km). | Medium weight wheel bearing grease. | | √ | √ | √ | **Repack** | √ |
| 16 | * | **Wheel bearings** | • Check bearings for smooth rotation. | - | | √ | √ | √ | √ | √ |
| 17 | * | **Rear suspension link pivots** | • Apply grease lightly. | Molybdenum disulfide grease | | | | | √ | |

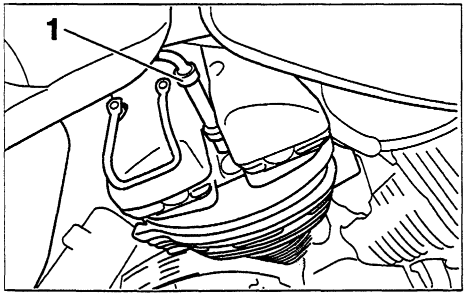
* Since these items require special tools, data and technical skills, they should be serviced by a Yamaha dealer.

**NOTE:**

For odometer readings or time periods higher than 20,000 mi (31,000 km) or 30 months, repeat the same maintenance as listed in the chart from the 4,000 mi (7,000 km) or 6 month interval.

**NOTE:**

- The air filter needs more frequent service if you are riding in unusually wet or dusty areas.
- Hydraulic brake and clutch systems
  - After disassembling the master cylinder, caliper cylinder or clutch release cylinder, always replace the brake fluid. Check the brake fluid level of the master cylinder and clutch release cylinder regularly and fill as required.
  - Replace the oil seals on the inner parts of the master cylinder, caliper cylinder and clutch release cylinder every two years.
  - Replace the brake and clutch hoses every four years or if cracked or damaged.

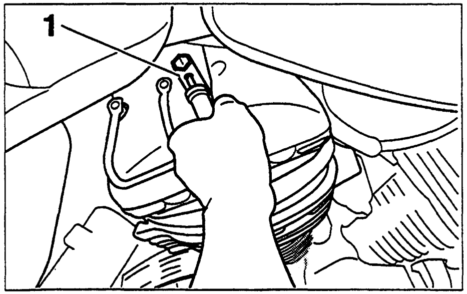


1. Spark plug cap

## Spark plugs

### Removal

1. Remove the spark plug cap.
2. Use the spark plug wrench in the tool kit to remove the spark plug as shown.

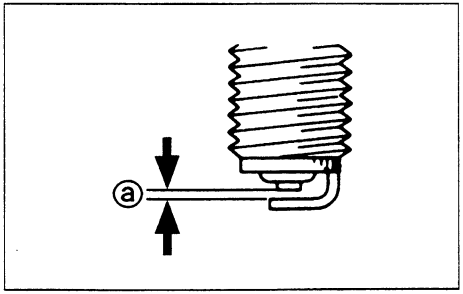


1. Spark plug wrench

### Inspection

The spark plug is an important engine component and is easy to inspect. The condition of the spark plug can indicate the condition of the engine. Normally, all spark plugs from the same engine should have the same color on the white insulator around the center electrode. The ideal color at this point is a medium-to-light tan color for a motorcycle that is being ridden normally. If one spark plug shows a distinctly different color, there could be something wrong with the engine. Do not attempt to diagnose such problems yourself. Instead, take the motorcycle to a Yamaha dealer. You should periodically remove and inspect the spark plugs because heat and deposits will cause any spark plug to slowly break down and erode. If electrode erosion becomes excessive, or if carbon and other deposits are excessive, you should replace the spark plug with the specified plug.

Specified spark plug:
DPR7EA-9/NGK or
X22EPR-U9/DENSO



a. Spark plug gap

### Installation

1. Measure the electrode gap with a wire thickness gauge and, if necessary, adjust the gap to specification.

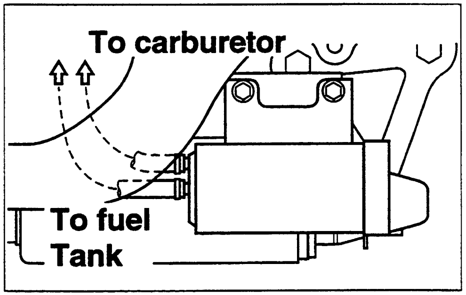
Spark plug gap:
0.03 ~ 0.04 in (0.8 ~ 0.9 mm)

2. Clean the gasket surface. Wipe off any grime from the threads.
3. Install the spark plug and tighten it to the specified torque.

Tightening torque:
Spark plug:
12.5 ft·lb (1.75 m·kg, 17.5 Nm)

**NOTE:**

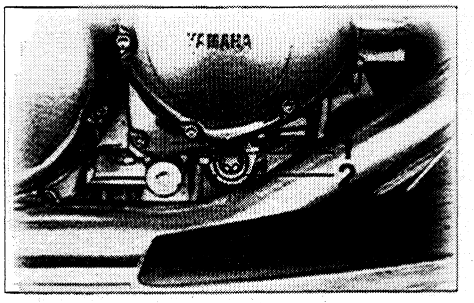
If a torque wrench is not available when you are installing a spark plug, a good estimate of the correct torque is 1/4 to 1/2 turn past finger tight. Have the spark plug tightened to the specified torque as soon as possible.



## Canister (for California only)

This model is equipped with a canister to prevent the discharging of fuel vapor into the atmosphere. Before using this motorcycle, be sure to check the following:

- Check each hose connection.
- Check each hose and canister for cracks or damage. Replace if damaged.
- Make sure the canister breather is not blocked. Clean it if necessary.



1. Maximum level mark
2. Minimum level mark

## Engine oil

### Oil level inspection

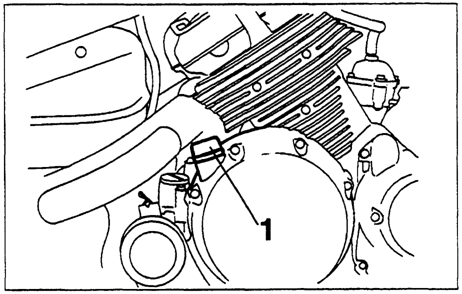
1. Place the motorcycle on a level place and hold it in an upright position. Warm up the engine for several minutes.

**NOTE:**
Be sure the motorcycle is positioned straight up when checking the oil level. A slight tilt toward the side can result in false readings.

2. Stop the engine and wait for a few minutes. Check the oil level through the level window located at the lower part of the right side crankcase cover.

**NOTE:**
Wait a few minutes until the oil level settles before checking.

3. The oil level should be between the maximum and minimum marks. If the level is low, fill the engine with sufficient recommended oil to reach the specified level.

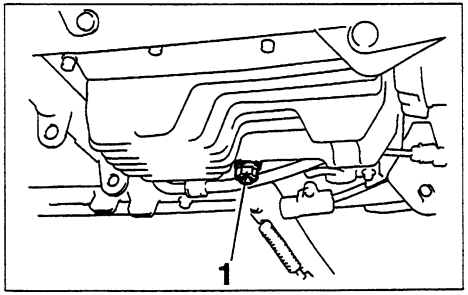


1. Engine oil filler cap

### Engine oil and oil filter cartridge replacement

1. Warm up the engine for several minutes.
2. Stop the engine. Place an oil pan under the engine and remove the oil filler cap.
3. Remove the drain plug and drain the oil.
4. Remove the oil filter by using an oil filter wrench.

**NOTE:**
An oil filter wrench is available at a nearby Yamaha dealer.



1. Engine oil drain plug

5. Reinstall the drain plug and tighten it to the specified torque.

Tightening torque:
Drain plug:
31 ft·lb (4.3 m·kg, 43 Nm)

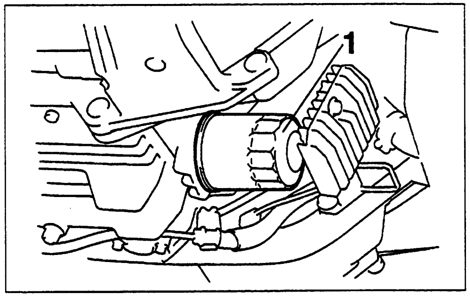
6. Apply a light coat of engine oil to the O-ring of new oil filter.

**NOTE:**
Make sure the O-ring is seated properly.

7. Install the new oil filter and tighten it to the specified torque with an oil filter wrench.

**NOTE:**
When installing the oil filter, tighten it to the proper torque by using a torque wrench.

Tightening torque:
Oil filter:
12 ft·lb (1.7 m·kg, 17 Nm)



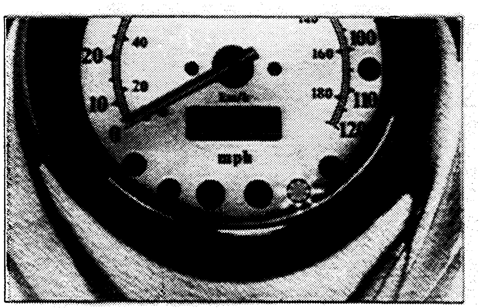
1. Engine oil filter cartridge

8. Fill the engine with sufficient recommended oil. Install the oil filler cap and tighten it.

Recommended oil:
See page 8-1.
Oil quantity:
Total amount:
4.5 US qt (3.8 Imp qt, 4.3 L)
Periodic oil change:
3.7 US qt (3.1 Imp qt, 3.5 L)
With oil filter replacement:
3.9 US qt (3.3 Imp qt, 3.7 L)

**CAUTION:**

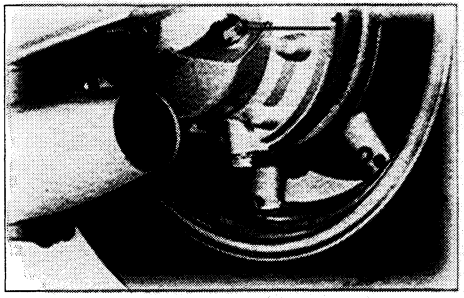
- **Do not put in any chemical additives. Engine oil also lubricates the clutch and additives could cause clutch slippage.**
- **Be sure no foreign material enters the crankcase.**



9. Start the engine and warm it up for several minutes. While warming up, check for oil leakage. If oil leakage is found, stop the engine immediately and check for the cause.
10. After the engine is started, the oil level indicator light should go off if the oil is at the specified level.

**CAUTION:**

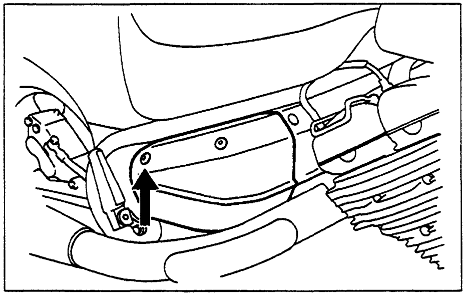
**If the indicator light flickers or remains on, immediately stop the engine and consult with a Yamaha dealer.**



1. Final gear oil filler bolt
2. Final gear oil drain plug

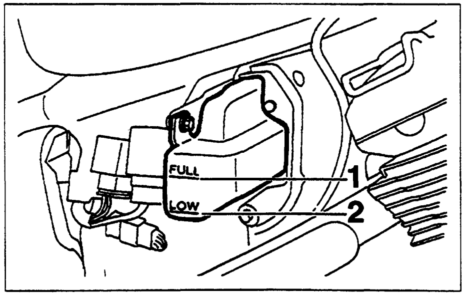
## Final gear oil

Check for oil leakage. If any leakage is found, take the motorcycle to a Yamaha dealer for repairs.



## Coolant

1. Remove the reservoir tank cover by removing the screw.
2. Check the coolant level in the reservoir tank when the engine is cold as the coolant level will vary with engine temperature. The coolant level should be between the maximum and minimum marks.
3. If the level is low, remove the rider's seat, open the reservoir tank cap and add coolant or distilled water to raise it to the specified level. (See page 3-11 for seat removal procedures.)



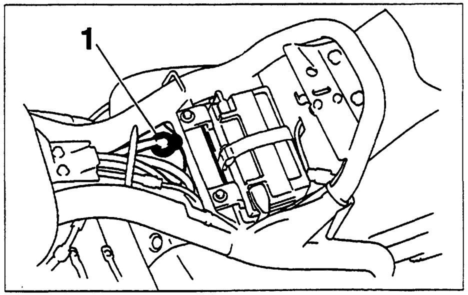
1. Maximum level mark
2. Minimum level mark

4. Install the reservoir tank cap and rider's seat.
5. Place the reservoir tank cover in the original position and install the screw.

Reservoir tank capacity:
0.89 US qt (0.74 Imp qt, 0.84 L)

**CAUTION:**

**Hard water or salt water is harmful to the engine. You may use distilled water if you can't get soft water.**



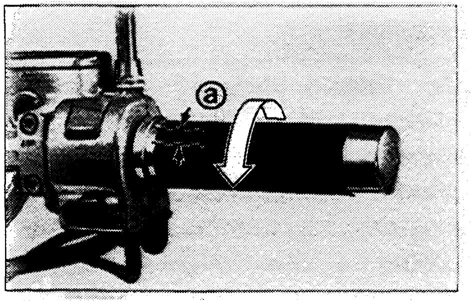
1. Reservoir tank cap

**NOTE:**

- If water is added, have a Yamaha dealer check the antifreeze content of the coolant as soon as possible.
- Have a Yamaha dealer change the coolant every two years.
- The radiator fan operation is completely automatic. It is switched on or off according to the coolant temperature in the radiator.

## Carburetor adjustment

The carburetors are important parts of the engine and emission control system. Adjusting should be left to a Yamaha dealer with the professional knowledge, specialized data and equipment to do so properly.



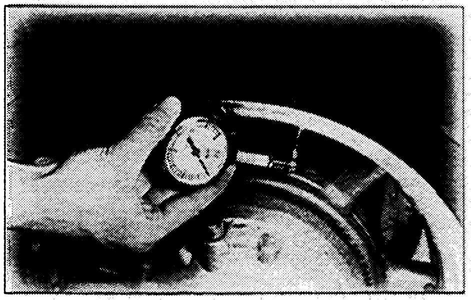
a. Free play

## Throttle cable free play inspection

There should be a free play of 0.16 ~ 0.24 in (4 ~ 6 mm) at the throttle grip. If the free play is incorrect, ask a Yamaha dealer to make this adjustment.

## Valve clearance adjustment

The correct valve clearance changes with use, resulting in improper fuel/air supply or engine noise. To prevent this, the valve clearance must be adjusted regularly. This adjustment however, should be left to a professional Yamaha service technician.



## Tires

To ensure maximum performance, long service and safe operation, note the following:

### Tire air pressure

Always check and adjust the tire pressure before operating the motorcycle.

**⚠ WARNING**

**Tire inflation pressure should be checked and adjusted when the temperature of the tire equals the ambient air temperature. Tire inflation pressure must be adjusted according to total weight of cargo, rider, passenger, and accessories (fairing, saddlebags, etc. if approved for this model), and vehicle speed.**

| Maximum load* | XVZ13A(C): 448 lb (203 kg)<br>XVZ13AT(C): 410 lb (186 kg) | |
|---|---|---|
| Cold tire pressure | Front | Rear |
| Up to 198 lb (90 kg) load* | 36 psi (2.50 kgf/cm², 250 kPa) | 36 psi (2.50 kgf/cm², 250 kPa) |
| 198 lb (90 kg) load ~ Maximum load* | 36 psi (2.50 kgf/cm², 250 kPa) | 41 psi (2.80 kgf/cm², 280 kPa) |

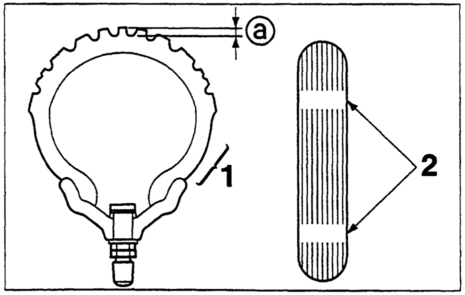
* Load is the total weight of cargo, rider, passenger, and accessories.

**⚠ WARNING**

**Proper loading of your motorcycle is important for several characteristics of your motorcycle, such as handling, braking, performance and safety. Do not carry loosely packed items that can shift. Securely pack your heaviest items close to the center of the motorcycle, and distribute the weight evenly from side to side. Properly adjust the suspension for your load, and check the condition and pressure of your tires. NEVER OVERLOAD YOUR MOTORCYCLE. Make sure the total weight of the cargo, rider, passenger, and accessories (fairing, saddlebags, etc. if approved for this model) does not exceed the maximum load of the motorcycle. Operation of an overloaded motorcycle could cause tire damage, an accident, or even injury.**

### Tire inspection

Always check the tires before operating the motorcycle. If a tire tread shows crosswise lines (minimum tread depth), if the tire has a nail or glass fragments in it, or if the side wall is cracked, contact a Yamaha dealer immediately and have the tire replaced.



a. Tread depth
1. Sidewall
2. Wear indicator

| | |
|---|---|
| Minimum tire tread depth (front and rear) | 0.04 in (1.0 mm) |

**⚠ WARNING**

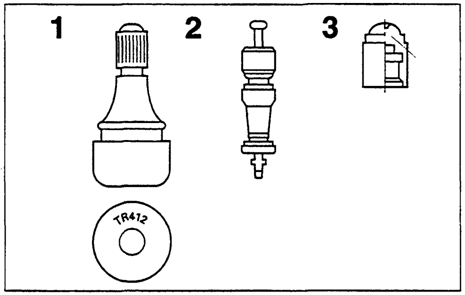
**It is dangerous to ride with a worn-out tire. When a tire tread begins to show lines, have a Yamaha dealer replace the tire immediately. Brakes, tires and related wheel parts replacement should also be left to a Yamaha dealer.**

### Tire information

This motorcycle is equipped with tubeless tires, tire valves and cast wheels.

**⚠ WARNING**

**After extensive tests, the tires mentioned below have been approved by Yamaha Motor Co., Ltd. for this model. No guarantee for handling characteristics can be given if tire combinations other than what is approved are used on this motorcycle. The front and rear tires should be of the same manufacture and design. Always use the tire valves and valve cores listed below. Be sure to install the valve caps securely, as these are important to prevent air pressure leakage.**



1. Tire valve
2. Valve core
3. Valve cap with seal

FRONT

| Manufacturer | Size | Type |
|---|---|---|
| Dunlop | 150/80-16 71H | D404F |
| Bridgestone | 150/80-16 71H | G705 |

| | Type |
|---|---|
| Tire valve | TR412 |
| Valve core | #9000A |

REAR

| Manufacturer | Size | Type |
|---|---|---|
| Dunlop | 150/90B15M/C 74H | D404 |
| Bridgestone | 150/90B15M/C 74H | G702 |

| | Type |
|---|---|
| Tire valve | PVR59A |
| Valve core | #9000 |

## Wheels

To ensure maximum performance, long service, and safe operation, note the following:

- Always inspect the wheels before a ride. Check for cracks, bends or warpage of the wheels. If any abnormal condition exists in a wheel, consult a Yamaha dealer. Do not attempt even small repairs to the wheel. If a wheel is deformed or cracked, it must be replaced.
- Tires and wheels should be balanced whenever either one is changed or replaced. Failure to have a wheel balanced can result in poor performance, adverse handling characteristics and shortened tire life.
- Ride at moderate speeds after changing a tire since the tire surface must first be broken in for it to develop its optimal characteristics.
- After repairing or replacing the rear tire, tighten the valve stem nut and locknut to the specified torque.

Tightening torque:
Valve stem nut:
1.16 ft·lb (0.16 m·kg, 1.6 Nm)
Valve stem locknut:
1.16 ft·lb (0.16 m·kg, 1.6 Nm)

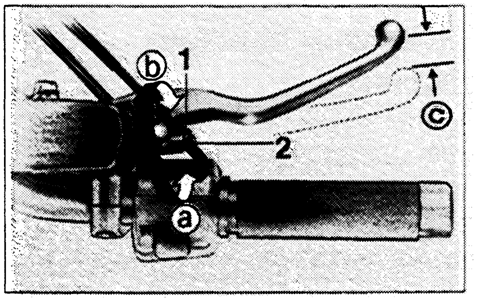
## Accessories or replacement parts

**WARNING**

**This motorcycle is not designed to pull a trailer or to be attached to a sidecar. The accessories or replacement parts you choose for your motorcycle should be designed specifically for it, and they must be securely mounted to maintain the inherent stability of the original design. Genuine Yamaha Parts and Accessories are designed and tested to be compatible with your motorcycle. Please consider Genuine Yamaha Parts and Accessories before making an accessory purchase. Use of non-Yamaha-approved parts or accessories may cause loss of handling stability and riding safety. Since Yamaha cannot control the quality of parts or accessories manufactured by other companies, Yamaha cannot be held liable for any consequences caused by the use of items which have not been approved by Yamaha.**

## Clutch lever free play adjustment

This motorcycle has a hydraulic clutch. There are no adjustments to perform but the clutch system must be inspected periodically for proper fluid level and leakage. If the control lever free play becomes excessive and the motorcycle creeps or stalls when shifted into gear, or if the clutch slips, causing acceleration to lag behind engine speed, there is probably air in the clutch system and it must be bled out. Ask a Yamaha dealer to do this service.



1. Locknut
2. Adjusting bolt
c. Free play

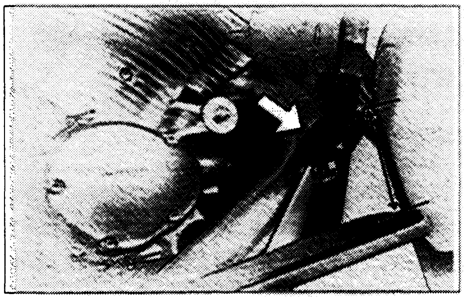
## Front brake lever free play adjustment

The free play at the front brake lever should be 0.08 ~ 0.2 in (2 ~ 5 mm).

1. Loosen the locknut.
2. Turn the adjusting bolt in direction ⓐ to increase free play or in direction ⓑ to decrease free play.
3. After adjusting, tighten the locknut.

**⚠ WARNING**

- **Check the brake lever free play. Be sure the brake is working properly.**
- **A soft or spongy feeling in the brake lever can indicate the presence of air in the brake system. This air must be removed by bleeding the brake system before the motorcycle is operated. Air in the system will cause greatly diminished braking capability and can result in loss of control and an accident. Have a Yamaha dealer inspect and bleed the system if necessary.**

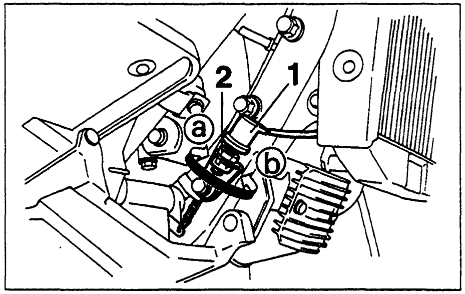


## Rear brake pedal height adjustment

The top of the brake pedal should be positioned 3.9 in (100 mm) below the top of the footrest. If not, ask a Yamaha dealer to adjust it.

**⚠ WARNING**

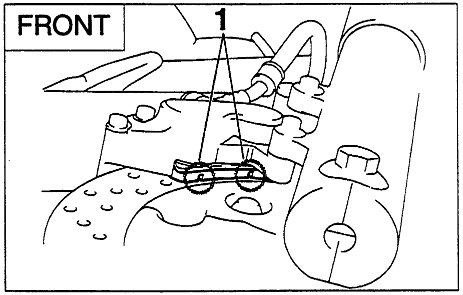
**A soft or spongy feeling in the brake pedal can indicate the presence of air in the brake system. This air must be removed by bleeding the brake system before the motorcycle is operated. Air in the system will cause greatly diminished braking capability and can result in loss of control and an accident. Have a Yamaha dealer inspect and bleed the system if necessary.**



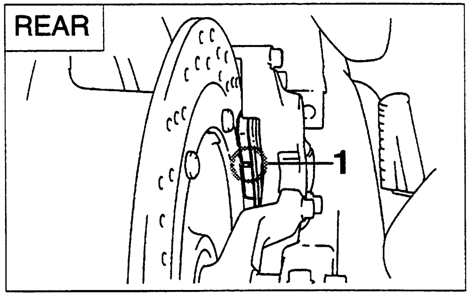
1. Brake light switch
2. Adjusting nut

## Brake light switch adjustment

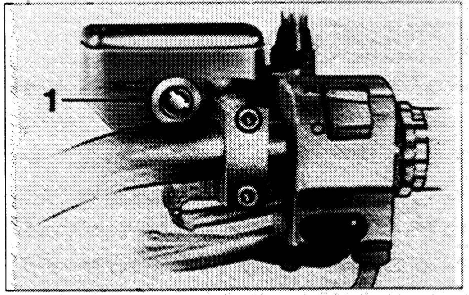
The rear brake light switch is activated by the brake pedal and is properly adjusted when the brake light comes on just before braking takes effect. To adjust the rear brake light switch, hold the switch body so it does not rotate while turning the adjusting nut. Turn the adjusting nut in direction ⓐ to make the brake light come on earlier. Turn the adjusting nut in direction ⓑ to make the brake light come on later.



1. Wear indicator groove (× 2)



1. Wear indicator groove



1. Minimum level mark

## Checking the front and rear brake pads

### Front brake

Wear indicator grooves are provided on each brake pad. These indicators allow checking of brake pad wear without disassembling the brake. Inspect the grooves. If they have almost disappeared, ask a Yamaha dealer to replace the pads.

### Rear brake

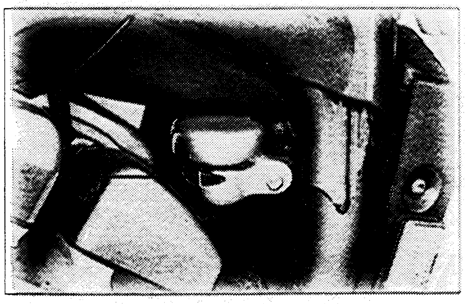
A wear indicator groove is provided on each brake pad. This indicator allows checking of brake pad wear without disassembling the brake. Inspect the groove. If the groove has almost disappeared, ask a Yamaha dealer to replace the pads.

## Inspecting the brake fluid level

Insufficient brake fluid may let air enter the brake or clutch system, possibly causing them to become ineffective. Before riding, check that the brake fluid is above the minimum level and fill when necessary.

Observe these precautions:

1. When checking the fluid level, make sure the top of the master cylinder is level by turning the handlebars.

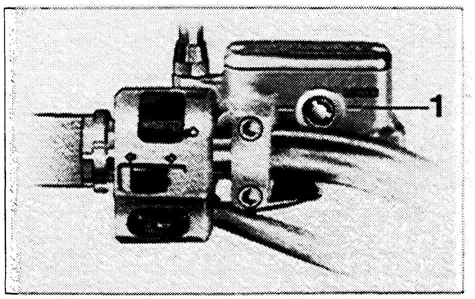


1. Minimum level mark

2. Use only the designated quality brake fluid. Otherwise, the rubber seals may deteriorate, causing leakage and poor brake or clutch performance.

| Recommended brake fluid: DOT 4 |
|---|

3. Refill with the same type of brake fluid. Mixing fluids may result in a harmful chemical reaction and lead to poor brake or clutch performance.



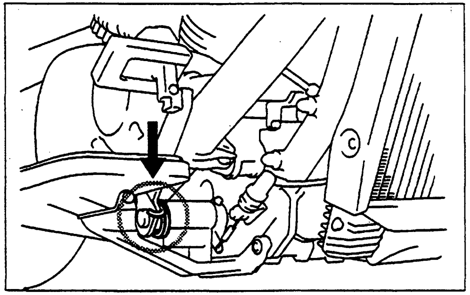
1. Minimum level mark

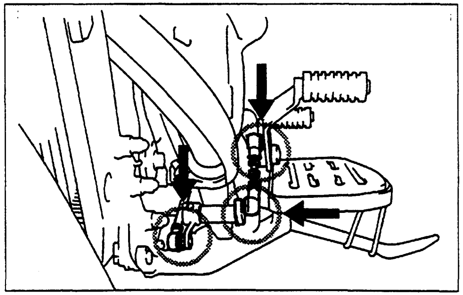
4. Be careful that water does not enter the master cylinder when refilling. Water will significantly lower the boiling point of the fluid and may result in vapor lock.
5. Brake fluid may deteriorate painted surfaces or plastic parts. Always clean up spilled fluid immediately.
6. Have a Yamaha dealer check the cause if the brake fluid level goes down.

## Brake fluid replacement

The brake fluid should be replaced only by trained Yamaha service personnel. Have the Yamaha dealer replace the following components during periodic maintenance or when they are damaged or leaking:

a. oil seals (every two years)
b. brake hoses (every four years)

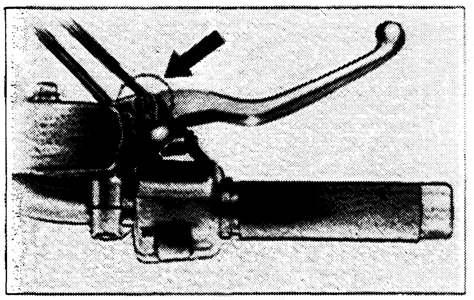




## Brake and shift pedal lubrication

Lubricate the pivoting parts.

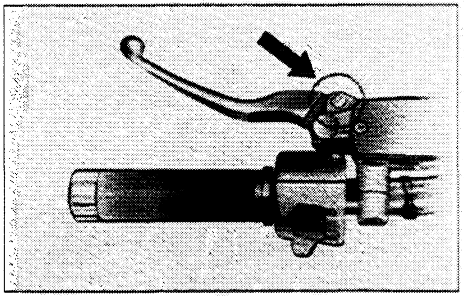
Recommended lubricant:
Yamaha Chain and Cable Lube
or SAE 10W30 motor oil

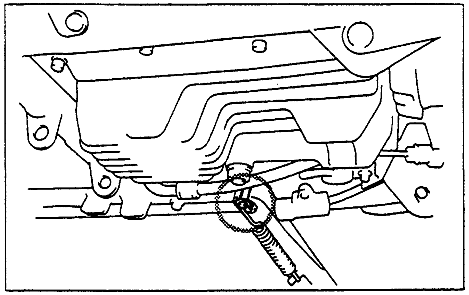


## Brake and clutch lever lubrication

Lubricate the pivoting parts.

Recommended lubricant:
Yamaha Chain and Cable Lube
or SAE 10W30 motor oil





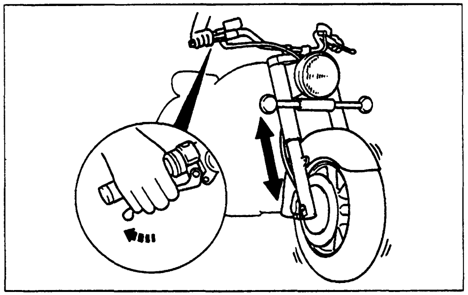
## Sidestand lubrication

Lubricate the sidestand pivoting point and metal-to-metal contact surfaces. Check that the sidestand moves up and down smoothly.

Recommended lubricant:
Yamaha Chain and Cable Lube
or SAE 10W30 motor oil

**⚠ WARNING**

**If the sidestand does not move smoothly, consult a Yamaha dealer.**



## Front fork inspection

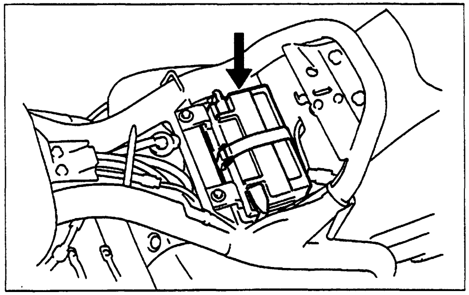
**WARNING**

**Securely support the motorcycle so there is no danger of it falling over.**

1. Visual check
   Check for scratches or damage on the inner tube and excessive oil leakage from the front fork.
2. Operation check
   Place the motorcycle on a level place.
   a. Hold the motorcycle in an upright position and apply the front brake.
   b. Push down hard on the handlebars several times and check if the fork rebounds smoothly.

**CAUTION:**

**If any damage or unsmooth movement is found with the front fork, consult a Yamaha dealer.**



## Battery

This motorcycle is equipped with a sealed-type battery. Therefore it is not necessary to check the electrolyte or fill the battery with distilled water.

- If the battery seems to have discharged, consult a Yamaha dealer.
- If the motorcycle is equipped with optional electrical accessories, the battery tends to discharge more quickly, so be sure to recharge it periodically.

**CAUTION:**

**Never try to remove the sealing caps of the battery cells. The battery will be damaged.**

**WARNING**

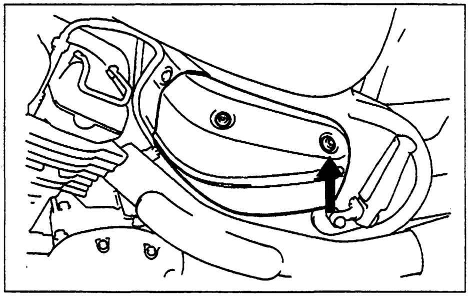
**Battery electrolyte is poisonous and dangerous, causing severe burns, etc. It contains sulfuric acid. Avoid contact with skin, eyes or clothing.**
**ANTIDOTE:**
**EXTERNAL: Flush with water.**
**INTERNAL: Drink large quantities of water or milk. Follow with milk of magnesia, beaten egg, or vegetable oil. Call a physician immediately.**
**EYES: Flush with water for 15 minutes and get prompt medical attention. Batteries produce explosive gases. Keep sparks, flame, cigarettes etc., away. Ventilate when charging or using in an enclosed space. Always shield your eyes when working near batteries.**
**KEEP OUT OF REACH OF CHILDREN.**

### Battery storage

When the motorcycle is not used for a month or longer, remove the battery, fully charge it and store it in a cool, dry place.

**CAUTION:**

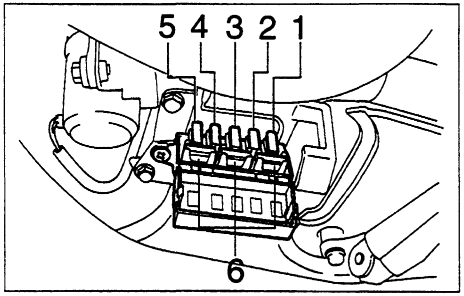
- **Completely recharge the battery before storing. Storing a discharged battery can cause permanent battery damage.**
- **Use a battery charger designed for a sealed-type (MF) battery. Using a conventional battery charger will cause battery damage. If you do not have a sealed-type battery charger, contact your Yamaha dealer.**
- **Always make sure the connections are correct when reinstalling the battery.**



## Fuse replacement

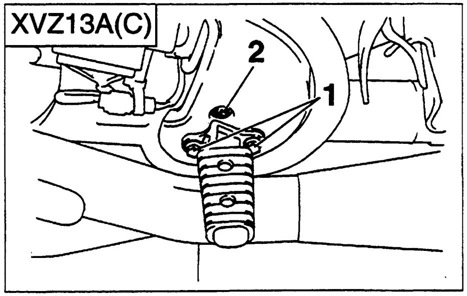
### Sub fuse box

The sub fuse box is located behind the upper left side panel. To remove the panel, remove the screw and pull the panel outward.



1. Ignition fuse
2. Signaling system fuse
3. Headlight fuse
4. Fan fuse
5. Back up fuse (odometer)
6. Spare fuse (× 3)

| Specified fuses: | |
|---|---|
| Ignition fuse: | 10 A |
| Signaling system fuse: | |
| (XVZ13A) | 10 A |
| (XVZ13AT) | 20 A |
| Headlight fuse: | |
| (XVZ13A) | 15 A |
| (XVZ13AT) | 20 A |
| Fan fuse: | 10 A |
| Back up fuse (Odometer): | 5 A |



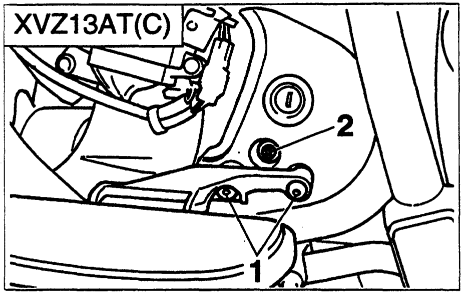
1. Bolt (× 2)
2. Screw

### Main fuse box

The main fuse box is located behind the lower left side panel.

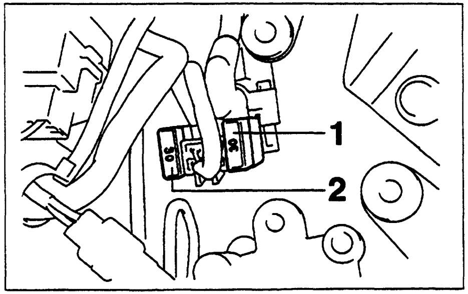
To remove the panel

1. Remove the upper side panel. (See under “Sub fuse box”.)
2. Remove the left passenger footrest by removing the bolts.
3. Remove the screw and pull the panel outward.



1. Bolt (× 2)
2. Screw

If any fuse is blown, turn off the main switch and the switch of the circuit in question. Install a new fuse of specified amperage. Turn on the switches and see if the electrical device operates. If the fuse immediately blows again, consult a Yamaha dealer.

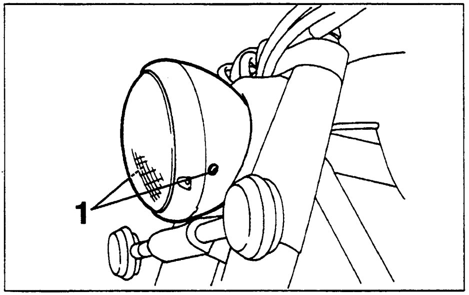


1. Main
2. Spare

**CAUTION:**

**Do not use fuses of higher amperage rating than those recommended. Substitution of a fuse of improper rating can cause extensive electrical system damage and possibly a fire.**

Specified fuse:
Main fuse: 30 A

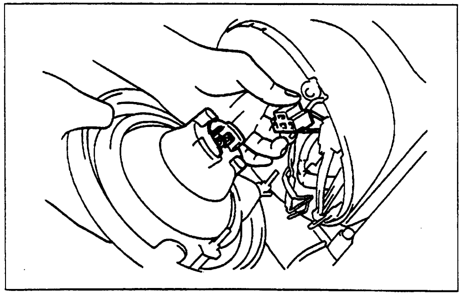


1. Screw (× 2)

## Headlight bulb replacement

This motorcycle is equipped with a quartz bulb headlight. If the headlight bulb burns out, replace the bulb as follows:

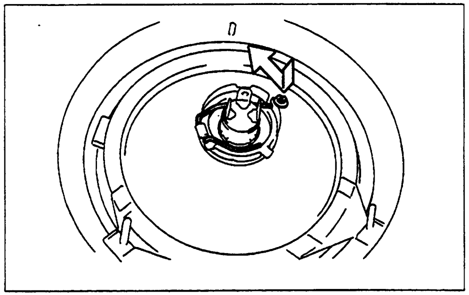
1. Remove the screws holding the headlight assembly.
2. Remove the headlight connector and the bulb cover.
3. Unhook the bulb holder and remove the defective bulb.



**⚠ WARNING**

**Keep flammable products and your hands away from a bulb while it is on, as it is hot. Do not touch a bulb until it cools down.**

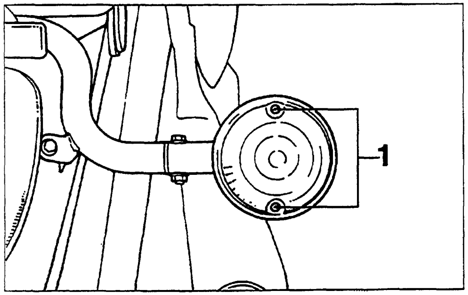
4. Put a new bulb into position and secure it in place with the bulb holder.



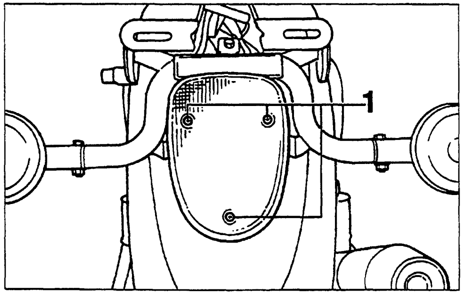
**CAUTION:**

**Avoid touching the glass part of a bulb. Keep it free from oil; otherwise, the transparency of the glass, life of the bulb, and luminous flux will be adversely affected. If oil gets on a bulb, thoroughly clean it with a cloth moistened with alcohol or lacquer thinner.**

5. Install the bulb cover and the headlight connector. If the headlight beam adjustment is necessary, ask a Yamaha dealer to make that adjustment.



1. Screw (× 2)



1. Screw (× 3)

## Turn signal and taillight bulb replacement

1. Remove the screws and the lense.
2. Push the bulb inward and turn it counterclockwise.
3. Place a new bulb in the socket. Push the bulb inward and turn it clockwise until it engages into the socket.
4. Install the lense and the screws.

**CAUTION:**

**Do not over-tighten the screws as the lense may break.**

## Troubleshooting

Although Yamaha motorcycles receive a rigid inspection before shipment from the factory, trouble may occur during operation.

Any problem in the fuel, compression, or ignition systems can cause poor starting and loss of power. The troubleshooting chart describes a quick, easy procedure for making checks.

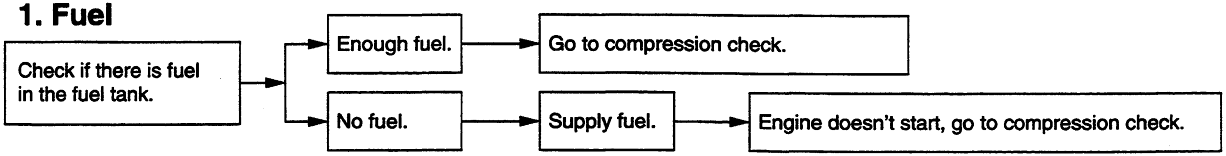
If your motorcycle requires any repair, bring it to a Yamaha dealer. The skilled technicians at a Yamaha dealership have the tools, experience, and know-how to properly service your motorcycle. Use only genuine Yamaha parts on your motorcycle. Imitation parts may look like Yamaha parts, but they are often inferior. Consequently, they have a shorter service life and can lead to expensive repair bills.

## Troubleshooting chart

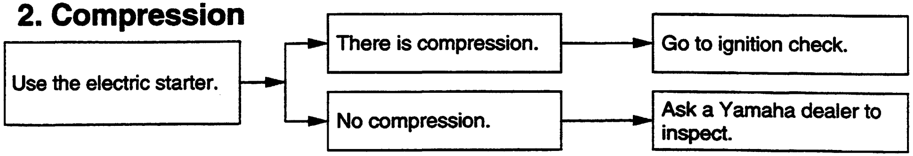
**⚠ WARNING**

**Never check the fuel system while smoking or in the vicinity of an open flame.**

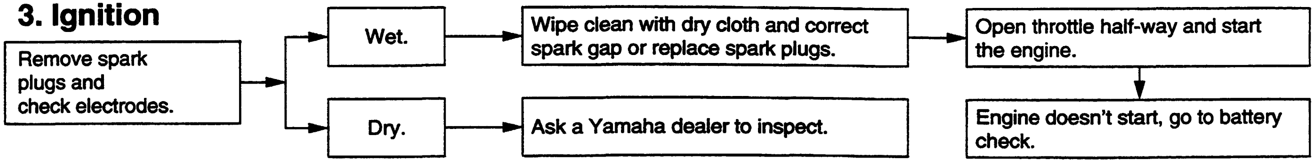
### 1. Fuel


Check if there is fuel in the fuel tank.
Enough fuel.
Go to compression check.
No fuel.
Supply fuel.
Engine doesn't start, go to compression check.

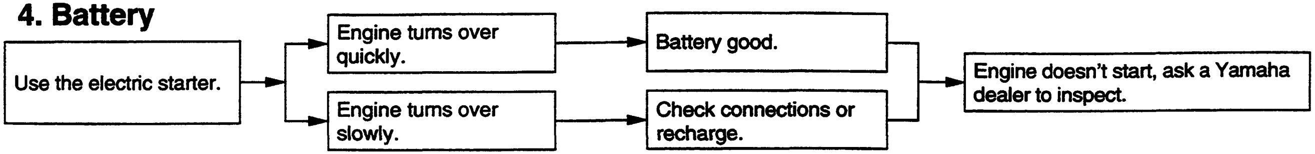
### 2. Compression


Use the electric starter.
There is compression.
Go to ignition check.
No compression.
Ask a Yamaha dealer to inspect.

### 3. Ignition


Remove spark plugs and check electrodes.
Wet.
Wipe clean with dry cloth and correct spark gap or replace spark plugs.
Open throttle half-way and start the engine.
Engine doesn't start, go to battery check.
Dry.
Ask a Yamaha dealer to inspect.

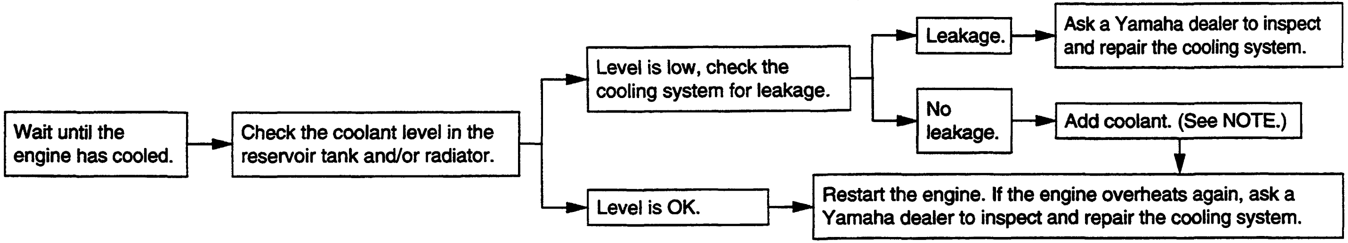
### 4. Battery


Use the electric starter.
Engine turns over quickly.
Battery good.
Engine turns over slowly.
Check connections or recharge.
Engine doesn't start, ask a Yamaha dealer to inspect.

## 5. Engine overheating

**WARNING**

**Do not remove the radiator cap when the engine and radiator are hot. Scalding hot fluid and steam may be blown out under pressure, which could cause serious injury. Open the radiator cap as follows. Wait until the engine has cooled. Remove the radiator cap stopper by removing the screw. Place a thick rag like a towel over the radiator cap and slowly rotate the cap counterclockwise to the detent. This procedure allows any residual pressure to escape. When the hissing sound has stopped, press down on the cap while turning counterclockwise and remove it.**


Wait until the engine has cooled.
Check the coolant level in the reservoir tank and/or radiator.
Level is low, check the cooling system for leakage.
Leakage.
Ask a Yamaha dealer to inspect and repair the cooling system.
No leakage.
Add coolant. (See NOTE.)
Level is OK.
Restart the engine. If the engine overheats again, ask a Yamaha dealer to inspect and repair the cooling system.

**NOTE:**

If it is difficult to get the recommended coolant, tap water can be temporarily used, provided that it is changed to the recommended coolant as soon as possible.

# MOTORCYCLE CARE AND STORAGE

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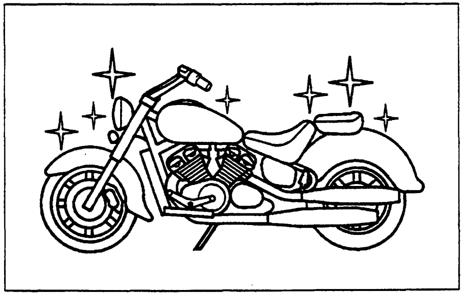
# CLEANING AND STORAGE



## Cleaning

Frequent, thorough cleaning of your motorcycle will not only enhance its appearance but will improve its general performance and extend the useful life of many components.

**CAUTION:**

- **Improper cleaning can damage the windshield, cowlings, panels and other plastic parts. Use only a soft, clean cloth or sponge with mild detergent and water to clean plastic. If the windshield is scratched, use a quality plastic polishing compound after washing.**
- **Do not use any harsh chemical products on plastic parts. Be sure to avoid using cloths or sponges which have been in contact with strong or abrasive cleaning products, solvent or thinner, fuel (gasoline), rust removers or inhibitors, brake fluid, antifreeze or electrolyte.**

---

1. Before cleaning the motorcycle:
   a. Block off the end of the exhaust pipes to prevent water entry; a plastic bag and strong rubber band may be used.
   b. Make sure the spark plugs and all filler caps are properly installed.
2. If the engine case is excessively greasy, apply Yamaha Mud and Grease Release or other quality degreaser with a paint brush. Do not apply degreaser to wheel axles.
3. Rinse the dirt and degreaser off with a garden hose. Use only enough pressure to do the job.

**CAUTION:**

**Excessive hose pressure may cause water seepage and deterioration of wheel bearings, front fork, brakes, transmission seals and electrical parts.**

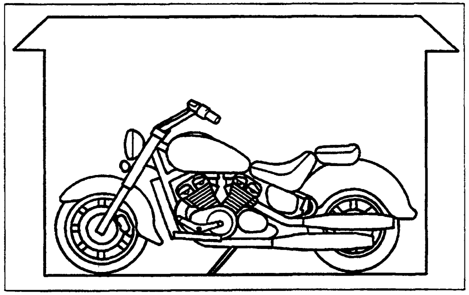
**Many expensive repair bills have resulted from improper high pressure detergent applications such as those available in coin-operated car washers.**

---

4. Once the majority of the dirt has been hosed off, wash all surfaces (except leather saddlebags) with warm water and mild, detergent-type soap. An old toothbrush or bottle brush is handy for hard-to-get-at places.
5. Rinse the motorcycle off immediately with clean water and dry all surfaces with a chamois, clean towel, or soft absorbent cloth.
6. Clean the seat with Yamaha Protectant or an equivalent vinyl upholstery cleaner to keep the cover pliable and glossy.
7. Windshield cleaning [XVZ13AT(C)]
   Avoid using any alkaline or strong acid cleaner, gasoline, brake fluid, or any other solvent. Clean the windshield with a cloth or sponge dampened with a neutral detergent, and after cleaning, thoroughly wash it off with water. For additional cleaning, use Yamaha Windshield Cleaner or other quality cleaner. Some cleaning compounds for plastics may leave scratches on surfaces of the windshield. Before using them, make a test by polishing an area which does not affect your visibility.
8. Apply Yamaha Silicone Wax or other automotive-type wax on all painted and chrome-plated surfaces. Avoid combination cleaner-waxes. Many contain abrasives which may mar the paint or protective finish. When finished, start the engine and let it idle for several minutes.

## Saddlebag cleaning and care

Use a good grade of saddle soap. Rub lightly over the surface of the soap with a damp cloth or sponge to produce a lather. Apply the lather to the surface of the saddlebag. Allow to dry. When dry, polish with a soft cloth to remove all traces of the dry lather. If the saddlebag has been exposed to severe weather conditions over a long period of time and has become faded, or if it has been scuffed by rough use, you can use a fine boot creme to return the leather to its original rich, even color. Exposure to the elements can result in the drying out of the leather saddlebag. To replenish the oils necessary to beautiful leather, an occasional application of mink oil is recommended. Make sure the saddlebag is clean and dry before applying the mink oil. Using a soft cloth or a dauber, work a thin coat of mink oil into the leather surface of the saddlebag. Wipe off excess immediately and allow to dry for several hours. This application will also enhance the water resistance of the saddlebag.



## Storage

Long term storage (60 days or more) of your motorcycle will require some preventive procedures to guard against deterioration. After thoroughly cleaning the motorcycle, prepare for storage as follows:

1. Top off the fuel tank with fresh fuel and add one ounce of Yamaha Fuel Conditioner and Stabilizer or an equivalent stabilizer to each gallon of fuel.

**NOTE:**

Use of Yamaha Fuel Conditioner and Stabilizer eliminates the need to drain the fuel system. Consult your Yamaha dealer if the fuel system is to be drained instead.

2. Remove the spark plugs, pour about one tablespoon of SAE 10W30 or 20W40 motor oil in each spark plug hole and reinstall the spark plugs. Turn the engine over several times (ground the spark plug leads) to coat the cylinder walls with oil.

**⚠ WARNING**

**When using the starter motor to crank the engine, remove the spark plug wires, and ground them to prevent sparking.**

3. Lubricate all control cables.

**NOTE:**

Use a Yamaha Power Cable Luber and Yamaha Lube Zall or equivalent to pressure lubricate the cables and purge out any moisture between the inner and outer cables.

4. Block up the frame to raise both wheels off the ground.
5. Tie a plastic bag over the exhaust pipe outlets to prevent moisture from entering.
6. If storing in a humid or salt-air atmosphere, coat all exposed metal surfaces with a light film of oil. Do not apply oil to any rubber parts or the seat cover.
7. Remove the battery and fully charge it. Store it in a cool, dry place and recharge it once a month. Do not store the battery in an excessively warm or cold place [ less than 0°C (30°F) or more than 30°C (90°F) ]. See page 6-26 for battery storage precautions.

**NOTE:**

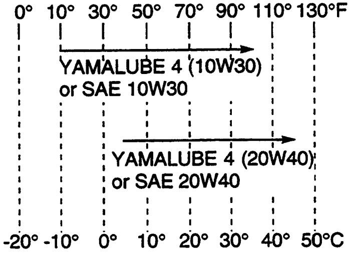
Make any necessary repairs before storing the motorcycle.

# SPECIFICATIONS

Specifications ........................................................................................ 8-1

## Specifications

| **Model** | **XVZ13A/AT** |
|---|---|
| **Dimensions** | |
| Overall length | 97.6 in (2,480 mm) |
| Overall width | 37.4 in (950 mm) |
| Overall height | |
| XVZ13A | 45.7 in (1,160 mm) |
| XVZ13AT | 55.9 in (1,420 mm) |
| Seat height | |
| XVZ13A | 28.1 in (715 mm) |
| XVZ13AT | 28.5 in (725 mm) |
| Wheelbase | 66.7 in (1,695 mm) |
| Ground clearance | 5.9 in (150 mm) |
| Minimum turning radius | 133.9 in (3,400 mm) |
| **Basic weight (with oil and full fuel tank)** | |
| XVZ13A | 728 lb (330 kg) |
| XVZ13AT | 765 lb (347 kg) |
| **Engine** | |
| Engine type | Liquid-cooled 4-stroke, DOHC |
| Cylinder arrangement | V type 4-cylinder |
| Displacement | 1,294 cm$^3$ |
| Bore × Stroke | 3.11 × 2.60 in (79 × 66 mm) |
| Compression ratio | 10:1 |
| Starting system | Electric starter |
| Lubrication system | Wet sump |
| **Engine oil** | |
| Type | |



| | |
|---|---|
| Recommended engine oil classification | API Service SE, SF, SG type or higher |

**CAUTION:**

**Be sure to use motor oils that do not contain anti-friction modifiers. Passenger car motor oils (often labeled "Energy Conserving") contain anti-friction additives which will cause clutch and/or starter clutch slippage, resulting in reduced component life and poor engine performance.**

| | |
|---|---|
| Capacity | |
| Periodic oil change | 3.7 US qt (3.1 Imp qt, 3.5 L) |
| With oil filter replacement | 3.9 US qt (3.3 Imp qt, 3.7 L) |
| Total amount | 4.5 US qt (3.8 Imp qt, 4.3 L) |
| **Final gear oil** | |
| Type | SAE80API "GL-4" Hypoid Gear Oil |
| Final gear case capacity | 0.21 US qt (0.18 Imp qt, 0.2 L) |
| **Radiator** | |
| Quantity (including all routes) | 3.1 US qt (2.55 Imp qt, 2.9 L) |
| **Air filter** | Dry type element |
| **Fuel** | |
| Type | Unleaded fuel |
| Fuel tank capacity | 4.8 US gal (4.0 Imp gal, 18 L) |
| Reserve amount | 0.9 US gal (0.8 Imp gal, 3.5 L) |
| **Carburetor** | |
| Type × quantity | BDS28 × 4 |
| Manufacturer | MIKUNI |
| **Spark plug** | |
| Type/Manufacturer | DPR7EA-9/NGK or<br>X22EPR-U9/DENSO |
| Gap | 0.03 ~0.04 in (0.8 ~ 0.9 mm) |
| **Clutch type** | Wet, multiple-disc |

| | | |
|---|---|---|
| **Transmission** | | |
| Primary reduction system | | Spur gear |
| Primary reduction ratio | | 1.666 |
| Secondary reduction system | | Shaft drive |
| Secondary reduction ratio | | 2.566 |
| Transmission type | | Constant mesh 5-speed |
| Operation | | Left foot operation |
| Gear ratio | 1st | 2.437 |
| | 2nd | 1.578 |
| | 3rd | 1.160 |
| | 4th | 0.906 |
| | 5th | 0.750 |
| **Chassis** | | |
| Frame type | | Double cradle |
| Caster angle | | 30° |
| Trail | | 5.0 in (126 mm) |
| **Tire** | | |
| Type | | Tubeless |
| Size | | |
| | Front | 150/80-16 71H |
| | Rear | 150/90B15M/C 74H |

| | |
|---|---|
| Manufacturer / model | |
| Front | Bridgestone / G705 |
| | Dunlop / D404F |
| Rear | Bridgestone / G702 |
| | Dunlop / D404 |
| Maximum load* | |
| XVZ13A | 448 lb (203 kg) |
| XVZ13AT | 410 lb (186 kg) |
| Air pressure (cold tire) | |
| Up to 198 lb (90 kg) load* | |
| Front | 36 psi; 2.50 kgf/cm$^2$; 250 kPa |
| Rear | 36 psi; 2.50 kgf/cm$^2$; 250 kPa |
| 198 lb (90 kg) load ~ maximum load* | |
| Front | 36 psi; 2.50 kgf/cm$^2$; 250 kPa |
| Rear | 41 psi; 2.80 kgf/cm$^2$; 280 kPa |

* Load is total weight of cargo, rider, passenger and accessories.

**Wheels**

| | |
|---|---|
| Type | |
| Front | Cast |
| Rear | Cast |
| Size | |
| Front | 16 × MT 3.50 |
| Rear | 15M/C × MT 4.00 |

**Brakes**

| | |
|---|---|
| Front | |
| Type | Dual disc brake |
| Operation | Right hand operation |
| Fluid | DOT 4 |
| Rear | |
| Type | Single disc brake |
| Operation | Right foot operation |
| Fluid | DOT 4 |

**Suspension**

| | |
|---|---|
| Front | |
| Type | Telescopic fork |
| Rear | |
| Type | Swingarm |

**Shock absorber**

| | |
|---|---|
| Front | Coil-air spring /Oil damper |
| Rear | Coil spring / Gas-oil damper |

**Wheel travel**

| | |
|---|---|
| Front | 5.5 in (140 mm) |
| Rear | 3.7 in (95 mm) |

| | |
|---|---|
| **Electrical** | |
| Ignition system | T.C.I. (digital) |
| Charging system | |
| Type | A.C. magneto |
| Standard output | 14 V 23 A @ 5,000 rpm |
| Battery | |
| Type | YTX20L-BS |
| Voltage, capacity | 12 V, 18 AH |
| **Headlight type** | Quartz bulb (Halogen) |
| **Bulb voltage, wattage × quantity** | |
| Headlight | 12 V, 60 W / 55 W × 1 |
| Tail / brake light | 12 V, 8 W / 27W × 1 |
| Front turn signal / Front position light | 12 V, 27 W / 8W × 2 |
| Rear turn signal light | 12 V, 27 W × 2 |
| Meter light | 14 V, 1.4 W × 2 |
| Neutral indicator light | 12 V, 1.7 W × 1 |
| High beam indicator light | 12 V, 1.7 W × 1 |
| Turn indicator light | 12 V, 1.7 W × 1 |
| Oil level indicator light | 12 V, 1.7 W × 1 |
| Fuel level indicator light | 14 V, 3 W × 1 |
| Engine overheat indicator light | 12 V, 1.7 W × 1 |
| Overdrive / Engine trouble indicator light | 12 V, 1.7 W × 1 |
| **Fuses** | |
| Main fuse | 30 A |
| Ignition fuse | 10 A |
| Signaling system fuse | |
| XVZ13A: | 10 A |
| XVZ13AT: | 20 A |
| Headlight fuse | |
| XVZ13A: | 15 A |
| XVZ13AT: | 20 A |
| Fan fuse | 10 A |
| Back up fuse | 5 A |

# CONSUMER INFORMATION

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## Identification numbers record

Record the key identification number, vehicle identification number and model label information in the spaces provided for assistance when ordering spare parts from a Yamaha dealer or for reference in case the vehicle is stolen.

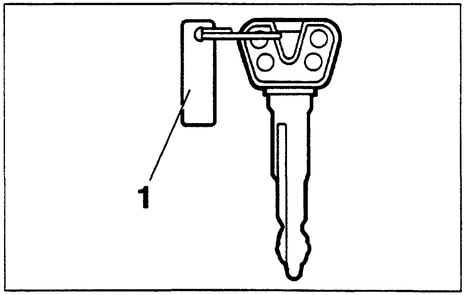
1. KEY IDENTIFICATION NUMBER:

2. VEHICLE IDENTIFICATION NUMBER:

3. MODEL LABEL INFORMATION:

○

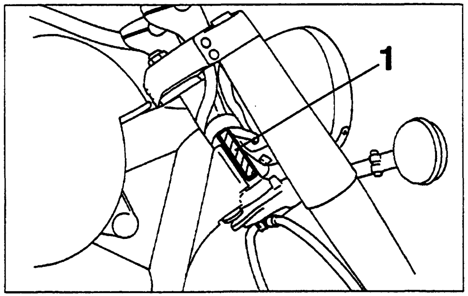
●



1. Key identification number

## Key identification number

The key identification number is stamped on the key tag. Record this number in the space provided and use it for reference when obtaining a new key.



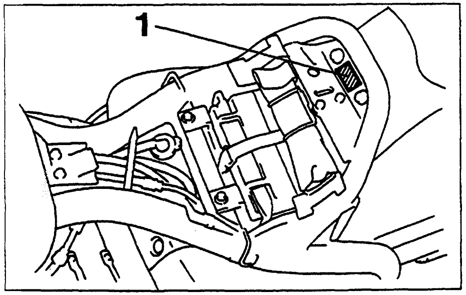
1. Vehicle identification number

## Vehicle identification number

The vehicle identification number is stamped into the steering head pipe. Record this number in the space provided.

**NOTE:**

The vehicle identification number is used to identify your motorcycle and may be used to register your motorcycle with the licensing authority in your state.



1. Model label

## Model label

The model label is affixed to the frame under the seat. (See page 3-11 for seat removal procedures.) Record the information on this label in the space provided. This information will be needed to order spare parts from your Yamaha dealer.

## Reporting safety defects

If you believe that your vehicle has a defect which could cause a crash or could cause injury or death, you should immediately inform the National Highway Traffic Safety Administration (NHTSA) in addition to notifying YAMAHA MOTOR CORP. U.S.A.. If NHTSA receives similar complaints, it may open an investigation, and if it finds that a safety defect exists in group of vehicles, it may order a recall and remedy campaign. However, NHTSA cannot become involved in individual problems between you, your dealer, or YAMAHA MOTOR CORP. U.S.A..

To contact NHTSA, you may either call the Auto Safety Hotline toll-free at 1-800-424-9393 (or 366-0123 in Washington, D.C. area) or write to: NHTSA, U.S. Department of Transportation, Washington, D.C. 20590. You can also obtain other information about motor vehicle safety from the Hotline.

## Motorcycle noise regulation

### TAMPERING WITH NOISE CONTROL SYSTEM PROHIBITED:

Federal law prohibits the following acts or the causing thereof: (1) The removal or rendering inoperative by any person other than for purposes of maintenance, repair, or replacement of any device or element of design incorporated into any new vehicle for the purpose of noise control prior to its sale or delivery to the ultimate purchaser or while it is in use or (2) the use of the vehicle after such device or element of design has been removed or rendered inoperative by any person.
"AMONG THOSE ACTS PRESUMED TO CONSTITUTE TAMPERING ARE THE ACTS LISTED BELOW".
These acts include tampering with the following systems; i.e., modification, removal, etc.

| | |
|---|---|
| Exhaust system | Muffler<br>Exhaust pipe<br>Silencer |
| Intake system | Air cleaner case<br>Air cleaner element<br>Intake duct |

## MAINTENANCE RECORD

Copies of work orders and/or receipts for parts you purchase and install will be required to document that maintenance has been completed in accordance with the emission warranty. The chart below is printed only as a reminder to you that the maintenance work is required. It is not acceptable proof of maintenance work.

| MAINTENANCE INTERVAL | DATE OF SERVICE | MILEAGE | SERVICING DEALER NAME AND ADDRESS | REMARKS |
|---|---|---|---|---|
| 600 mi (1,000km)or 1 mo. | | | | |
| 4,000 mi (7,000km)or 6 mos. | | | | |
| 8,000 mi (13,000km)or 12 mos. | | | | |
| 12,000 mi (19,000km)or 18 mos. | | | | |
| 16,000 mi (25,000km)or 24 mos. | | | | |
| 20,000 mi (31,000km)or 30 mos. | | | | |
| 24,000 mi (37,000km)or 36 mos. | | | | |

| MAINTENANCE INTERVAL | DATE OF SERVICE | MILEAGE | SERVICING DEALER NAME AND ADDRESS | REMARKS |
|---|---|---|---|---|
| 28,000 mi<br>(43,000km)or<br>42 mos. | | | | |
| 32,000 mi<br>(49,000km)or<br>48 mos. | | | | |
| 36,000 mi<br>(55,000km)or<br>54 mos. | | | | |
| 40,000 mi<br>(61,000km)or<br>60 mos. | | | | |

# YAMAHA ROYAL STAR™/ ROYAL STAR™ TOUR CLASSIC™ LIMITED WARRANTY

Yamaha Motor Corporation, U.S.A. hereby warrants that each new Yamaha Royal Star/ Royal Star Tour Classic motorcycle purchased from an authorized Yamaha motorcycle dealer in the continental United States will be free from defects in material or workmanship for the period of time stated herein, subject to certain stated limitations.

**THE PERIOD OF WARRANTY** for the Yamaha Royal Star/ Royal Star Tour Classic, including windshield, saddlebags, and mounting hardware installed as original equipment, shall be five (5) years from the date of purchase, regardless of mileage.

**MODELS EXCLUDED FROM WARRANTY** include those used for non-Yamaha-authorized renting, leasing, or other commercial purposes.

**DURING THE PERIOD OF WARRANTY** any authorized Yamaha motorcycle dealer will, free of charge, repair or replace any part adjudged defective by Yamaha due to faulty workmanship or material from the factory. Parts used in warranty repairs will be warranted for the balance of the product's warranty period. All parts replaced under warranty become property of Yamaha Motor Corporation, U.S.A..

**GENERAL EXCLUSIONS** from this warranty shall include any failures caused by:

a. Competition or racing use.
b. Installation of parts or accessories that are not qualitatively equivalent to genuine Yamaha parts.
c. Abnormal strain, neglect, or abuse.
d. Lack of proper maintenance or storage.
e. Accident or collision damage.
f. Modification to original parts.
g. Damage due to improper transportation.

**SPECIFIC EXCLUSIONS** from this warranty shall include:

1. The cost of parts and labor for routine maintenance or normal wear and tear. Examples include periodic oil changes and lubrication, filter cleaning and replacement, spark plugs, tune-ups, coolant, and brake and clutch adjustments.
2. Battery deterioration caused by improper maintenance and/or storage.

**THE CUSTOMER'S RESPONSIBILITY** under this warranty shall be to:
Operate and maintain the Royal Star/ Royal Star Tour Classic as specified in the appropriate Owner's Manual, and Give notice to an authorized Yamaha motorcycle dealer of any and all apparent defects within ten (10) days after discovery, and make the machine available at that time for inspection and repairs at such dealer's place of business.

**WARRANTY TRANSFER**

To transfer the warranty from the original purchaser to any subsequent purchaser, it is imperative that the machine be inspected and registered for warranty by an authorized Yamaha motorcycle dealer. In order for this warranty to remain in effect, this inspection and registration must take place within ten (10) days after transfer of ownership to the subsequent purchaser. A reasonable dealer-imposed fee may be charged for the inspection.

**EMISSIONS CONTROL SYSTEM WARRANTY**

Yamaha Motor Corporation, U.S.A. also warrants to the ultimate purchaser and each subsequent purchaser of each Royal Star/ Royal Star Tour Classic that the vehicle is designed, built, and equipped so as to conform at the time of sale with all U.S. emissions standards applicable at the time of manufacture, and that it is free from defects in materials and workmanship which would cause it not to meet these standards for 18, 642 miles (30,000 km) or five years, whichever occurs first. Failures other than those resulting from defects in material or workmanship which arise solely as a result of owner abuse and/or lack of proper maintenance are not covered by this warranty.

***YAMAHA MOTOR CORPORATION, U.S.A. MAKES NO OTHER WARRANTY OF ANY KIND, EXPRESSED OR IMPLIED. ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE WHICH EXCEED THE OBLIGATIONS AND TIME LIMITS STATED IN THIS WARRANTY ARE HEREBY DISCLAIMED BY YAMAHA MOTOR CORPORATION, U.S.A. AND EXCLUDED FROM THIS WARRANTY.***

***SOME STATES DO NOT ALLOW LIMITATIONS ON HOW LONG AN IMPLIED WARRANTY LASTS, SO THE ABOVE LIMITATION MAY NOT APPLY TO YOU. ALSO EXCLUDED FROM THIS WARRANTY ARE ANY INCIDENTAL OR CONSEQUENTIAL DAMAGES INCLUDING LOSS OF USE. SOME STATES DO NOT ALLOW THE EXCLUSION OR LIMITATION OF INCIDENTAL OR CONSEQUENTIAL DAMAGES, SO THE ABOVE EXCLUSIONS MAY NOT APPLY TO YOU.***

***THIS WARRANTY GIVES YOU SPECIFIC LEGAL RIGHTS, AND YOU MAY ALSO HAVE OTHER RIGHTS WHICH VARY FROM STATE TO STATE.***

YAMAHA MOTOR CORPORATION, U.S.A.
Post Office Box 6555
Cypress, CA 90630

## WARRANTY QUESTIONS AND ANSWERS

Q. What costs are my responsibility during the warranty period?
A. The customer's responsibility includes all costs of normal maintenance services, non-warranty repairs, accident and collision damage, and oil, oil filters, air filters, spark plugs, and brake shoes or pads.

Q. What are some examples of "abnormal" strain, neglect, or abuse?
A. These terms are general and overlap each other in areas. Specific examples include: Running the machine out of oil, sustained high-rpm, full-throttle use; operating the machine with a broken or damaged part which causes another part to fail; damage or failure due to improper or careless transportation and or tie down; and so on. If you have any specific questions on operation or maintenance, please contact your dealer for advice.

Q. Does the warranty cover incidental costs such as towing or transportation due to a failure?
A. No. The warranty is limited to repair of the machine itself.

Q. May I perform any or all of the recommended maintenance shown in the Owner's Manual instead of having the dealer do them?
A. Yes, if you are a qualified mechanic and follow the procedures specified in the Owner's and Service Manual. We do recommend, however, that items requiring special tools or equipment be done by Yamaha motorcycle dealer.

Q. Will the warranty be void or cancelled if I do not operate or maintain my new motorcycle exactly as specified in the Owner's Manual?
A. No. The warranty on a new motorcycle cannot be "voided" or "cancelled." **However, if a particular failure is caused by operation or maintenance other than as shown in the Owner's Manual, that failure may not be covered under warranty.**

Q. What responsibility does my dealer have under this warranty?
A. Each Yamaha Motorcycle dealer is expected to:

1. Completely set up every new machine before sale.
2. Explain the operation, maintenance, and warranty requirements to your satisfaction at the time of sale, and upon your request at any later date.

In addition, each Yamaha motorcycle dealer is held responsible for his setup, service and warmaty repair work.

Q. Is the warranty transferable to second owners?

A. Yes. The remainder of the existing warranty can be transferred upon request. The unit has to be inspected and re-registered by an authorized Yamaha motorcycle dealer for the warranty coverage to remain effective.

## CUSTOMER SERVICE

If your machine requires warranty service, you must take it to any authorized Yamaha motorcycle dealer within the continental United States. Be sure to bring your warranty registration identification or other valid proof of the original date of purchase. If a question or problem arises regarding warranty, first contact the owner of the dealership. Since all warranty matters are handled at the dealer level, this person is in the best position to help you. If you are still not satisfied and require additional assistance, please write:

YAMAHA MOTOR CORPORATION U.S.A.
CUSTOMER RELATIONS DEPARTMENT
P.O. Box 6555
Cypress, California 90630

When contacting Yamaha Motor Corporation, U.S.A. don't forget to include any important information such as names, addresses, model, V.I.N. (frame number), dates, and receipts.

## CHANGE OF ADDRESS

The federal government requires each manufacturer of a motor vehicle to maintain a complete, up-to-date list of all first purchasers against the possibility of a safety-related defect and recall. This list is compiled from the purchase registrations sent to Yamaha Motor Corporation, U.S.A. by the selling dealer at the time of your purchase.

If you should move after you have purchased your new motorcycle, please advise us of your new address by sending a postcard listing your motorcycle model name, V.I.N. (frame number), dealer number (or dealer's name) as it is shown on your warranty identification, your name and new mailing address. Mail to:

YAMAHA MOTOR CORPORATION, U.S.A.
P.O. Box 6555
Cypress, California 90630
Attention: Warranty Department

This will ensure that Yamaha Motor Corporation, U.S.A. has an up-to-date registration record in accordance with federal law.

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